

COMPUTER arts special

The in-depth guide for digital creatives

Illustration

Learn new techniques and styles with our practical walkthroughs

TUTORIALS

- Adding perspective in FreeHand
- How to make vector tracing even easier
- Create stylish fashion sketches
- Build and animate 3D wireframe images
- Symmetrical pattern designs in seconds

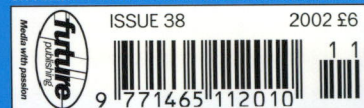
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TECHNIQUES

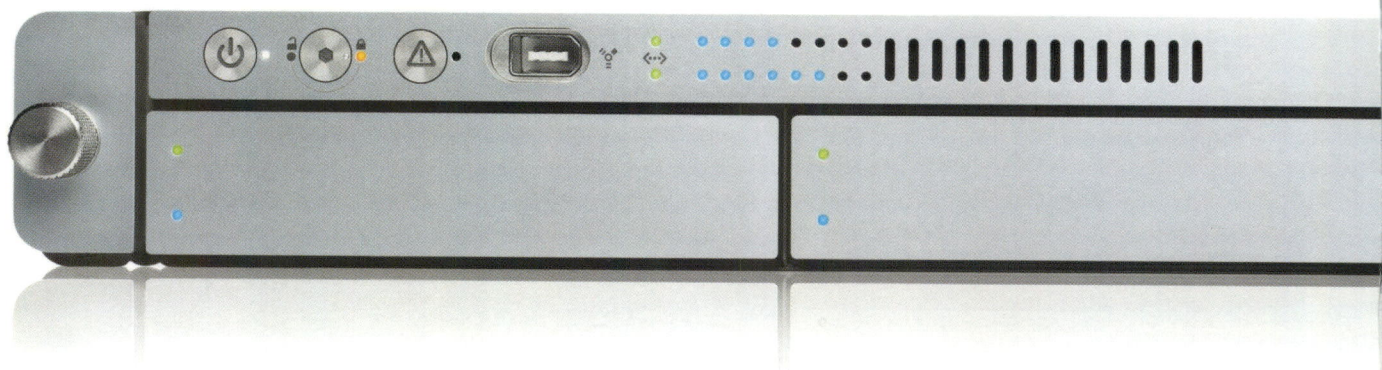
- Putting together the perfect portfolio — essential do's and don'ts
- Creating realistic textures with the latest version of CorelDRAW
- 50 easy illustration short-cuts

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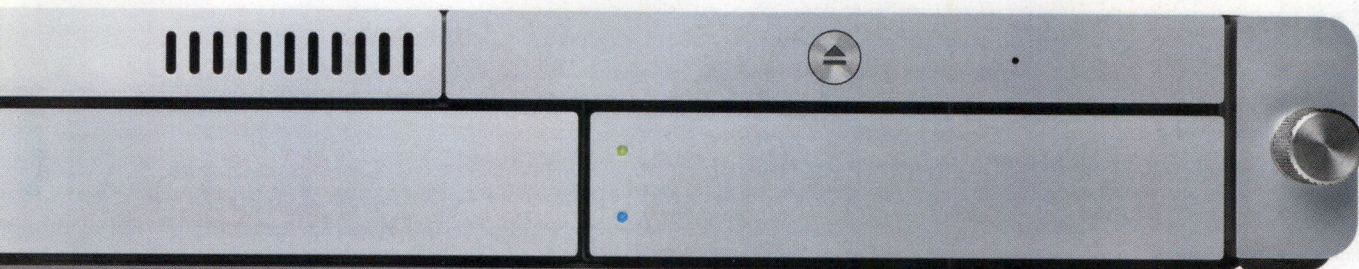


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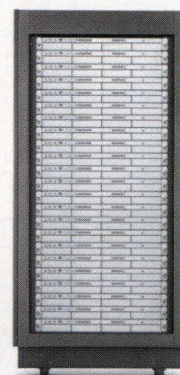
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The new Apple Xserve.

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COMPUTER arts special

The in-depth guide for digital creatives

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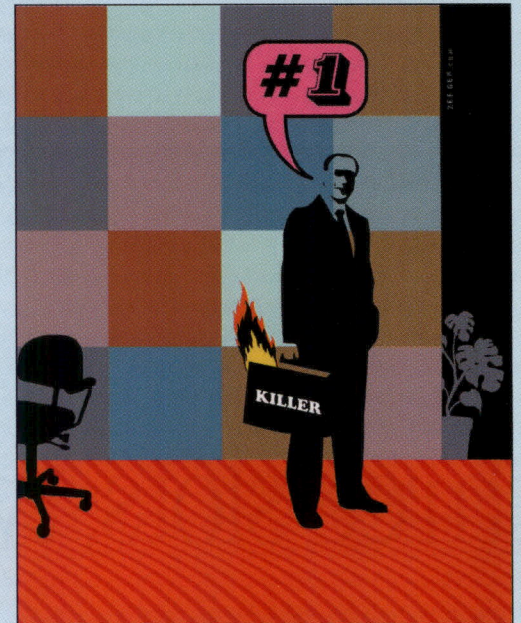
You can't get the perfect job without the perfect portfolio. Read our portfolio do's and don'ts

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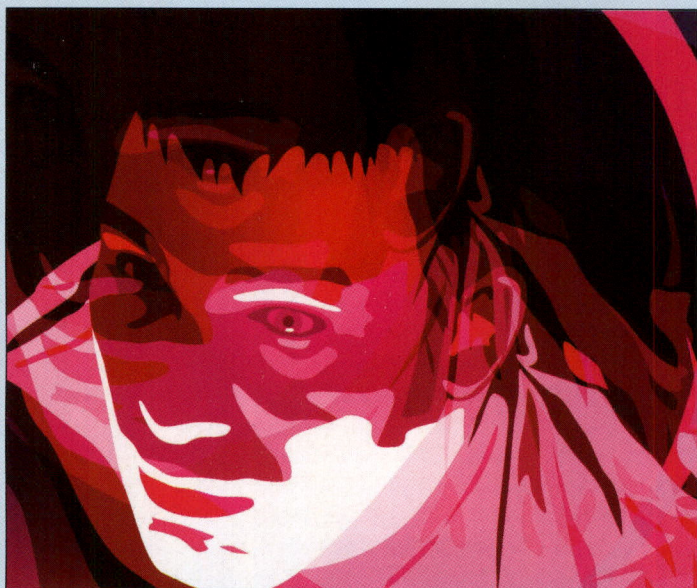
Mig's animated characters have a life and style of their own but he still swears by his pencil and pad for drafting



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Follow our walkthroughs to make these stunning images

CORE SKILLS »



STREAMLINE

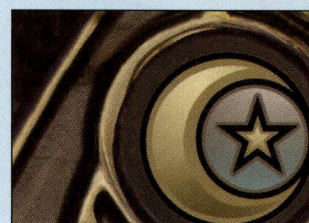
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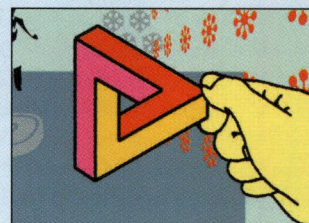
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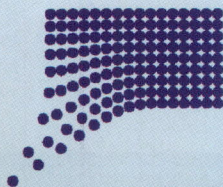
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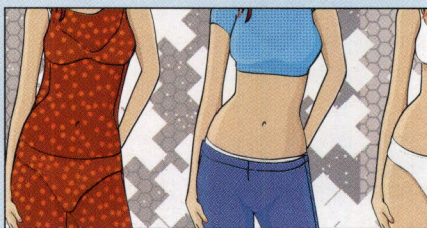


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Getting composition right is difficult with a busy image. Identikal show you how to achieve good results

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Mode III: sRGB targeted for landscape photography.

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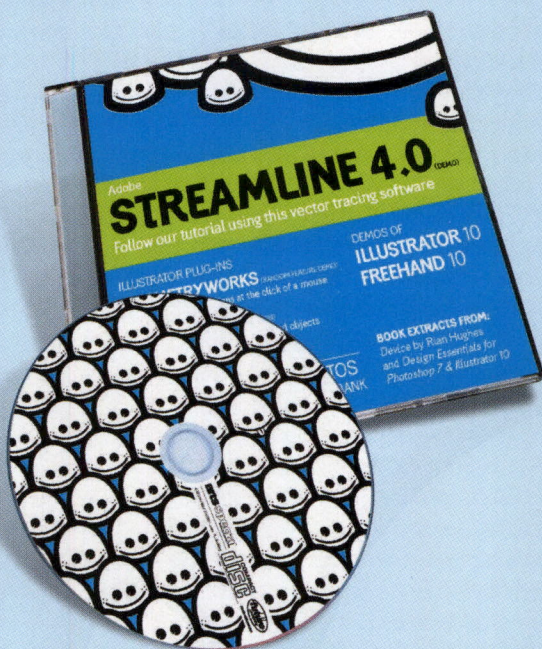


4 exposure modes: P - Auto multi program, S - Shutter priority, A - Aperture priority, M - Manual. 3 White Balance Modes: Auto, Manual [6 settings with fine tuning] and Preset.

Optional accessory: MB-D100 multi-function battery pack allows use of 6xAA batteries, vertical control of camera, voice annotations and 10 pin remote terminal [not shown].

The future of
photography

Nikon



SOFTWARE »

All you need for your illustration toolbox

DUAL

Streamline 4.0

Trace photographs using Streamline and turn them into vector illustrations. Follow our tutorial starting on page 68

DUAL

Illustrator 10

Build and repeat textures to produce skin and material effects as well as backgrounds. We'll show you how from page 22

DUAL

FreeHand 10

Get your composition perfect on page 58, and learn how to get things into perspective from page 46

DUAL 30-USE FULL VERSION

FILTERit 4.1

Create complex animated objects with this suite of plug-ins for Illustrator. See page 88

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SymmetryWorks

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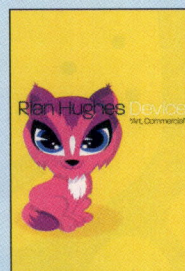
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IMAGES

Free Lomography images

We've got 10 free copyright-released images from The Lomographic World Archive which contains over 32,000 snapshots taken by Lomographers all over the world.



BOOKS

Book extracts

Read extracts in PDF format from two design books.

Device by Rian Hughes.

Design Essentials Fourth Edition for Photoshop 7 & Illustrator 10

arts special

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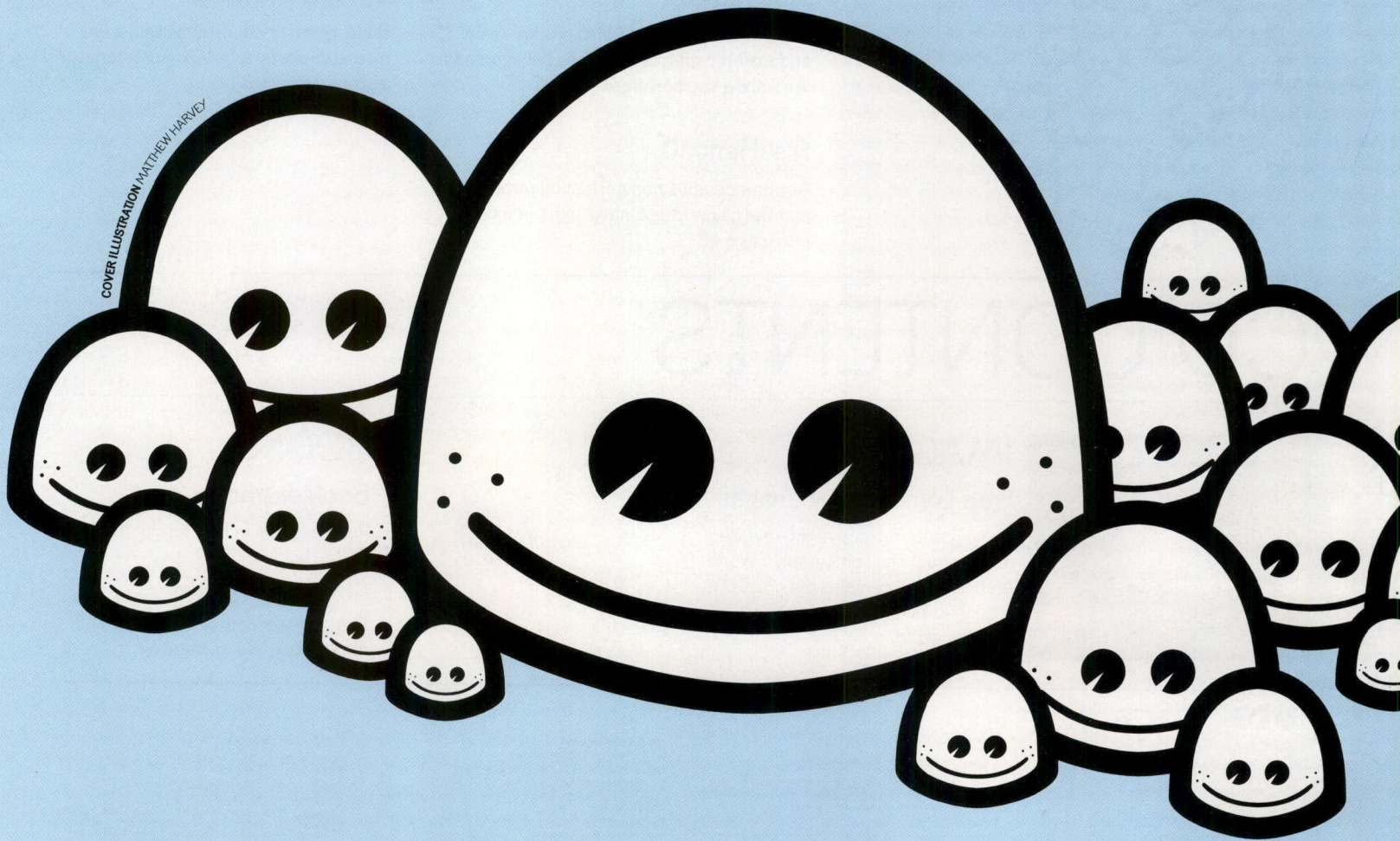
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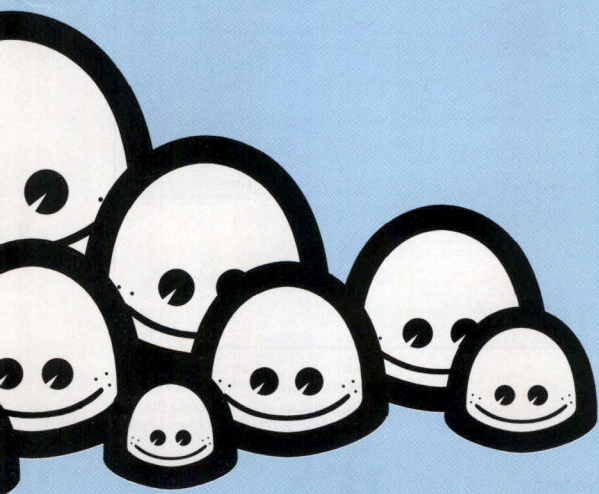
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50 illustration tricks

Help yourself to 50 fresh tricks, add-ons and updates for the top professional illustration applications to bring your tools and techniques bang up to date...

Call it a tall order, but over the next few pages you'll find no less than 50 hints and tips aimed squarely at the vector illustration artist. And these are new snippets of information, not a roundup of veteran favourites. What you read here is as fresh as the date on the cover of this magazine.

Nor do we make any apologies for aiming these tricks at the design professional rather than student or beginner. This is not a rehash of sidebar tips already found in manuals nor a summary of software quick reference cards. Instead, we've put together a collection of secret shortcuts, design suggestions, online resources, and general heads-up information for everyone

whose work relies on keeping their software skills up to date. You'll even discover where to find the best Web-based support, user forums and tutorials, and of course where you can download the latest program updates for free.

The tips have been split across the top six vector illustration programs on the market: *Adobe Illustrator 10*, *Macromedia FreeHand 10*, *CorelDRAW 11*, *Deneba Canvas 8*, *Xara X* and *Creature House Expression 3*. If you use any of these illustration products, you simply can't afford not to read on... >



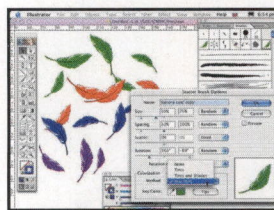
Expertise provided by Alistair Dabbs. You can contact Alistair at <tel:02084644686> or [e:ald@dabbsnet.com](mailto:ald@dabbsnet.com).

EXPRESSION 3

1

More expression

Creature House's real-media paint package *Expression*, based on vector 'skeletal strokes', is in the process of being upgraded to version 3. Even if the final release CD isn't ready for purchase when you read this, you can still download a fully functional copy of the program for a 30-day trial. Go to [w] www.creaturehouse.com/download3.htm.



Illustrator 10: Allowing alternative Colorization Methods in the Brush Options dialog windows makes in-tune colour changes quick and easy without ruining the original design.

ILLUSTRATOR 10

11

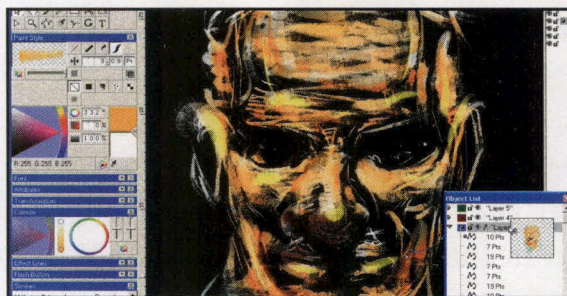
Up to date

Make sure you have downloaded and installed the latest version 10.0.3 update for Adobe *Illustrator 10*. This brings the program up to date for full compatibility with *Photoshop 7.0*, in particular *Photoshop's* five new blend modes and its support for anti-aliasing and layers slices. You can download the update from [w] www.adobe.com/support/downloads.

2

Scratch that itch

Use *Expression 3's* new Eraser blending mode to reproduce realistic scratch techniques. Fill a background layer with colours or an image, then create a new layer in front filled with black. Choose Eraser from the blending mode pop-out in the Paint Styles palette, and ensure it's set to Skeletal Stroke and No Fill. Your vector brush strokes will then 'scratch' away the black layer to reveal the colours underneath.



3

Bitmap crop

To export only a selected area of your *Expression 2* or *3* artwork to a bitmap format, first select the objects you want, then go to the Crop Marks submenu under the Edit menu and choose From Bounding box. Use the Save As Bitmap command under the File menu, entering a new filename and format, and put a tick next to Save Cropmark Region Only then the Bitmap Settings dialog window appears.

4

Instant thumbnails

Click and hold down the right mouse button on any object, group or layer name in *Expression 3's* Object List palette to call up an instant thumbnail of that item. Doing this will also select it in the artwork without changing the current target layer, just as if you had left-clicked.

5

Lighting when flat

Expression's Lighting tool enables you to manipulate light-and-shade fill effects on vector objects with embossed edges. But if you apply an initial emboss value of just -0.01, the object will not appear embossed at all but still let you experiment with the Lighting tool to alter the fill in creative ways.

12

Varied ideas

When experimenting with different versions of your artwork, for example to show different text content, use the Variables palette to set up the objects which will change. This way you can ensure visual consistency with each version without having to recreate those items manually. The point is that the Variables feature can be used for trying out ideas and comparing them, not just for multi-version final output.

13

Custom Brush keys

Art and Scatter Brushes in Adobe *Illustrator 10* can be customised for colour in more subtle ways than simply applying a new hue from the Colour or Swatches palettes. Double-click the brush before you paint with it, go to the Colorization section of the Brush Options dialog window, and alter the Method and Key Colour settings. Click on the tips button for a guide to what's possible.

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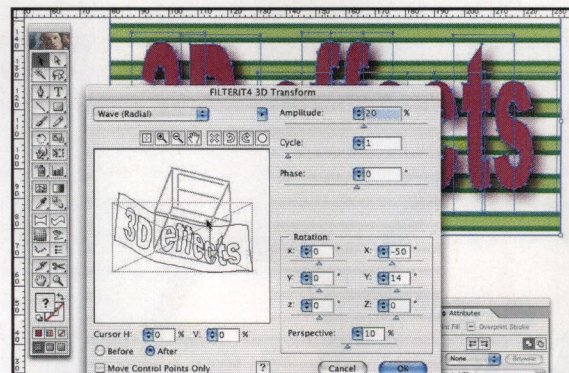
Perspective text

The easiest way to create perspective text effects in Adobe *Illustrator 10* is to use the Warp Options (Effect menu) with the Bend value set to 0. Otherwise, convert the text to outlines, switch to the Free Transform tool, click on a corner point of the bounding box, and then hold down the Command-Alt-Shift (Mac) or Ctrl-Alt-Shift key combination as you drag.

15

Latest plug-in

Arguably the most essential third-party plug-in for *Illustrator 10* is CValley's FILTERit. This comprises a set of tools for producing a wide range of creative effects such as motion blurs, 3D transformations, Flash animation, and lens distortion. The latest version 4.1.1, optimised for Windows XP and Mac OS X, was released at the end of summer 2002 and can be bought online at [w] www.cvalley.com.



XARA X

6

Bleach to fill

When you apply the Bleach blending mode to artwork in *Xara X*, anything that's completely black will be sent 100% transparent. Use this feature to turn black graphics, including imported 1bit bitmaps, into instant masks which reveal other objects you have placed behind them. The illusion is that the background artwork is a 'fill', but one that's considerably more flexible to edit.

7

Global naming

You can assign names to objects in *Xara X*, but try this: use the same name for disparate objects which you want to manage globally. This way, it doesn't matter if these objects are scattered across multiple layers, views or groups. Simply open the Name Gallery window, select the name, and every object you assigned that name to will be selected instantly.



Xara X: Apply the Bleach blending mode to make black areas of a vector object or imported bitmap transparent to reveal artwork and textures hidden behind.

16

Save styles

Whenever you create an effect for an Adobe *Illustrator 10* graphic that seems to 'work', open the Styles palette and save the effect as a New Style. It doesn't matter whether you want to apply the Style elsewhere in the artwork: successful combinations of stroke, fill, drop shadow and so on can always be useful in other work in the future. Get into the habit.

17

Cleaning DXFs

DXF graphics imported into Adobe *Illustrator 10* can sometimes fail to print or prevent you from saving your artwork to PDF format. The reason is invariably the sheer complexity of the paths in many DXF objects. Use the Simplify dialog window (Path submenu under the Object menu) to clean up the paths for better PostScript performance.

8

Tab toggles selection

The Tab key in *Xara X* toggles between all kinds of items throughout the program interface. For example, having Ctrl-clicked the start object of a blend to select it in isolation, pressing Tab toggles the selection back and forth between the start and end objects. When working on a multicolour gradient fill, pressing Tab skips between each of the colour 'stations' on the fill path.

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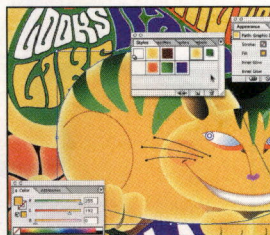
Liquid blobs

Produce the effect of blobby objects merging into each other like liquid in *Illustrator 10* using this pair of techniques. First Shift-select all the objects, open the Pathfinder palette and choose Make Compound Shape from the Palette menu. Then apply the Round Corners effect from the Effect menu (Stylise submenu). Watch the effect update as you edit the compound objects singly using the Direct Selection tool.

9

See scrolls

Xara X includes special support for mice with a mouse-wheel button. Click on any slider control in the program, and you can then adjust the slider left and right by rolling the wheel. And whenever you press the wheel button down, the on-screen cursor switches temporarily to the Push tool so that dragging the mouse scrolls the page around.



Illustrator 10: Whenever you create a successful stroke, fill and effect combination, get into the habit of saving it to the Styles palette for future use in this and other artwork.

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Help yourself

Every intensive user of Adobe *Illustrator 10* should spend a few minutes each week perusing Adobe's 'user to user' online forums. As with any unmoderated free forum, treat the Mr Angrys with a pinch of salt and head straight for the self-help topics. The two *Illustrator* forums (one each for Mac and Windows users) are good for solving niggling issues, confirming bugs you think you have found, and discovering workarounds. You'll find the forums at [\[w\] www.adobe.com/support/forums](http://www.adobe.com/support/forums).

10

Redraw secret

As with all vector illustration programs, *Xara X* occasionally leaves unwanted preview artefacts on screen as you manipulate your artwork. Although *Xara X* doesn't have a proper 'redraw screen' command, you can use a secret screen performance self-test facility to do it. Just type Ctrl-Shift-T. This redraws the screen immediately and also tells you how long it took.

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More assistance

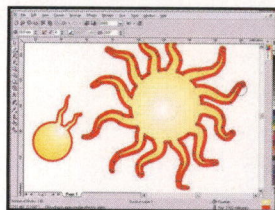
Another online source of help from your creative peers is the Tek-Tips Website, which hosts a useful Adobe *Illustrator* forum. Also featured are a few FAQs principally aimed at professional designers and existing *Photoshop* users who are looking at *Illustrator* for the first time. Go to [\[w\] www.tek-tips.com](http://www.tek-tips.com) and type 'illustrator' in the Search field. >

CORELDRAW 11

21

3-point curves

CorelDRAW 11's innovative new 3-Point Curve tool is unlike conventional Bézier Pen or Arc tools. To use it, click once where you want the curve to start, but keep the mouse button depressed as you drag out a straight line to where you want the curve to end. Release the mouse button, and the straight line becomes a curve which follows the mouse pointer until you click again.



CorelDRAW 11: The new Smudge brush lends itself to complex breakout sections from plain shapes, such as the rays from within the basic circle to make a sun graphic.

FREEHAND 10

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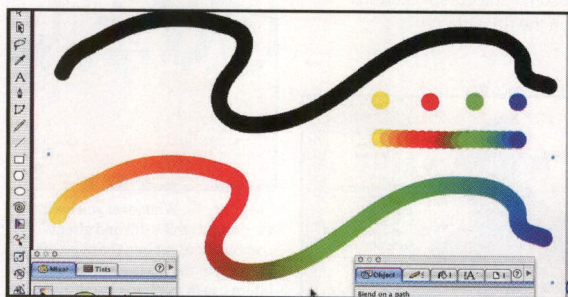
Repeat graphics

Use Macromedia *FreeHand 10's* Graphic Hose to lay down precision duplicates of your objects, step-and-repeat style. Copy the original object to the clipboard, double-click on the Graphic Hose tool in the Xtras Toolbar, and select New from the pop-up menu. Click Paste in to put the object into the new hose. Finally click Options at the top, change the Spacing pop-up to Grid and enter a value for the grid spacing you want.

22

Rough hands

CorelDRAW 11's new Roughen brush for distorting vector objects interactively is designed to react intelligently with Wacom tablets. With the Roughen brush selected, click the Use Stylus Tilt and Use Stylus Pressure buttons in the Property Bar, and set the Spike Direction drop-down menu to Stylus Setting. Now the effect follows your hand movement and downward pressure.



23

Smudged sunlight

Design an iconic vector image of the sun in *CorelDRAW 11* by using the new Smudge tool. First draw a circle with orange outline and yellow fill. Then with the Smudge tool, click inside the circle and drag outwards to create a wavy sunray. Continue around the circle to complete the effect. This technique can also draw quick custom starbursts.

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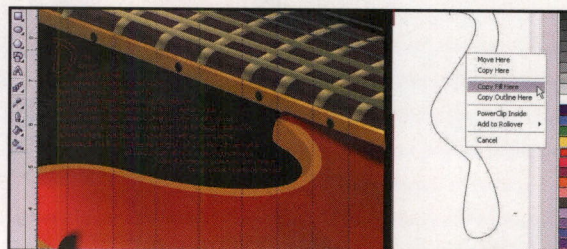
Duplicate placing

Pressing Ctrl-D (Windows) or Command-D (Mac) in *CorelDRAW* duplicates a selected object, putting it slightly to one side. But if you want to duplicate the object so that the duplicate is placed directly over the original, simply select the object and press the + key in your keyboard's numeric keypad.

25

Drag-copy properties

Here's a quick way to copy outline and fill properties from one object to another in *CorelDRAW*. Right-click (Windows) or Ctrl-click (Mac) the source object and drag it over the destination object whereupon the cursor becomes a little gunsight icon. Let go of the mouse button and a context menu appears. Among other choices, you can Copy Fill Here, Copy Outline Here or Copy All Properties.



CorelDRAW 11: Drag any object with the right mouse button (Windows) or with the Ctrl key held down (Mac) and drop it on another object to call up a Fill/Outline Copy context menu.

32

More repeat graphics

When you Duplicate (Edit menu) a selection in Macromedia *FreeHand 10* and then move it, the next time you use the Duplicate command, it will repeat not just the duplication but the move distance as well. Other transformations remembered by the Duplicate command are scale, rotate, reflect and skew.

33

Xtra updates

Although there are no recent application updates for Macromedia *FreeHand 10*, you can improve certain elements of the default program with updated Xtras. Xtra Updates for better *Photoshop* support and enhanced *Flash* export are available for free download from [w] www.macromedia.com/support/freehand.

34

Quick colours

You can create and add new colours to Macromedia *FreeHand 10's* Swatches panel in one click without even needing the Swatches panel open. Use the Colour Mixer panel as normal to create a colour, then Ctrl-click (Windows) or Command-click (Mac) the Add To Swatches button. This sends the new colour immediately to the Swatches without prompting you for a custom name.

35

Toggle tools

If you wished Macromedia *FreeHand 10* came with keyboard toggle commands to show and hide the Toolbox and panels, like all Adobe products have, here they are. Press F4 to toggle the panels on and off. Press Ctrl-7 (Windows) or Command-7 (Mac) to toggle the Toolbox on and off. Other Toolbars, including the Xtra Tools Toolbar, need to be closed by hand.

26

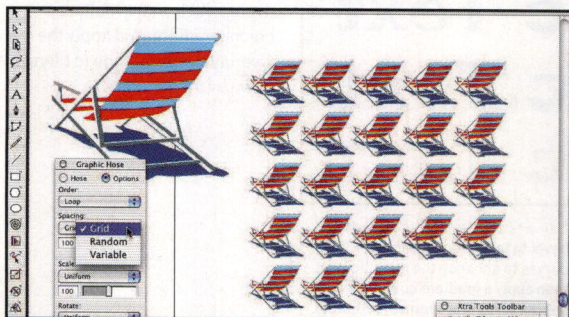
Quick page settings

Call up the Page Size Preferences dialog window for any open *CorelDRAW* document by double-clicking on the page border. Here you can also change resolution and bleed settings. Also, once this dialog is open, further Page-related dialog windows for Layout, Label, Background and Print Setup are just a click away.

27

Double-click tips

Double-click *CorelDRAW*'s Pick tool in the Toolbox to select everything on a page – the equivalent of typing Ctrl-A (Windows) or Command-A (Mac). Double-click the Zoom tool to fit the page's artwork on screen; note that this is not the same as fitting the entire page on screen. Double-click the Rectangle tool to create a rectangle which is the exact size of your page, behind all other objects already on there.



FreeHand 10: Paste a vector graphic into the Graphic Hose, then change its Spacing Options to Grid so that you can paint them in neat rows.

36

Web design

Here's a quick way to design a spider's web in Macromedia *FreeHand 10*. Open the Xtra Tools Toolbar and use the Spiral Xtra to draw a spiral. With the spiral still selected, go to the Xtras menu and choose Add Points from the Distort menu. Switch to the Bend Xtra tool. Click in the centre of the spiral and drag upwards to produce the web effect. Finish off by drawing straight lines across the web between the pointy bits.

37

Perspective wrapped up

Macromedia *FreeHand 10*'s Perspective Grid mode is a type of envelope, so use it as such. Keep the Envelope Toolbar open as you work with Perspective objects, allowing you even more manipulation versatility. For full control of the Perspective envelope, click the Show Map button in the Envelope Toolbar so you can view the internal envelope mesh for that object as well as the main Perspective Grid.

28

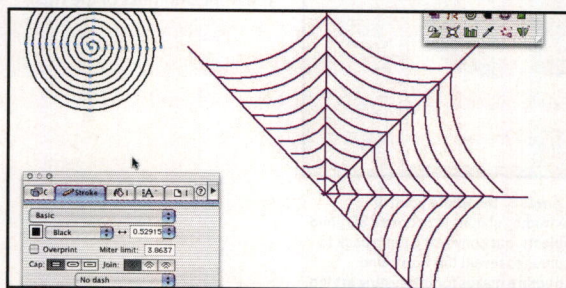
Selecting tips

Select one or more object in *CorelDRAW* by holding down the Alt key (Windows) or Option key (Mac) as you drag a marquee: any object even touching the area will be selected. To drill down through stacked objects to find a hidden one, click repeatedly while holding down the Alt/Option key. Holding this key also lets you select a single object from a group for editing on its own.

29

Scaled outlines

By default, *CorelDRAW 11* does not scale outline weight when resizing an object. Fix this by ticking Scale With Image in the Outline section of the Object Properties palette for the selected object. But if you forget and it's too late to Undo, you can still update multiple outlines in complex artwork without having to edit them all by hand by using the Find and Replace Wizard.



FreeHand 10: Here's another use for the Spiral Xtra, using the Bend Xtra to suck the curves inward between points so that a spider's web effect is generated.

30

Designer aid

Corel's most extensive online resource for *CorelDRAW* isn't at its main Website but at [w] www.designer.com. Here you will find a variety of brushes, clip art, artwork templates and so on, available for free download. It also provides quick access to the latest updates and patches, plus tutorials and tips.

38

Curvy gradients

Gradients applied to a curvy path won't follow the path's direction. But you can bask it by creating a number of objects (typically little circles) each filled with a step colour for your intended gradient. Create a blend between these objects to produce a fake gradient. Select the blend and the curvy path together, then apply the Join Blend to Path command from the Combine submenu under the Modify menu. Increase the number of steps in the Object Inspector as required to smooth out the result.

39

Heavy tutorials

Intermediate users of Macromedia *FreeHand 10* who want to move on to the next level should visit the *FreeHand* Source on the Web. This labour of love is a massive repository of tutorials and resources, including links to the remaining third parties still developing Xtras, and very useful cross-application tips for anyone using *FreeHand* with *Flash*. Go to [w] www.freehandsources.com.

40

Web forum

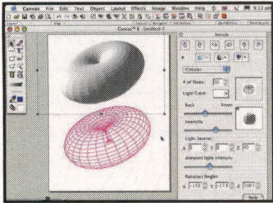
A busy unmoderated online forum for Macromedia *FreeHand* users is available if you're looking for fresh ideas or need technical help. Visit regularly to stay up to date. Avoid messages whose subjects contain multiple exclamation and/or question marks (these are just rants) so you don't waste your time. Go to [w] <http://webforums.macromedia.com/freehand>.

CANVAS 8

41

Version 8.0.4 update

Deneba *Canvas 8* has recently been updated to version 8.0.4. This update fixes a not inconsiderable number of bugs and glitches in addition to those addressed by the 8.0.3 release. Certain extra features have been added too. For example, the Windows version can now export to SVG format, and the Mac OS X version can save to PowerPoint format. Get your free update from [w] www.deneba.com/download.



Canvas 8: The whole point of extruding shapes is to create 3D solid objects, but converting them back to curves to reveal the wireframe structure makes for interesting art too.

46

Blending lines

Often the blend feature in an illustration package is used to create deformations and colour changes, but it can also be very effective with straight lines. Open Deneba *Canvas 8*'s Blend Objects palette and apply it to two lines at right angles to each other. A standard Dynamic blend adds intermediate lines to produce a thread matrix effect. With more thought you can easily produce Spirograph-like results.

42

Shiny surface

Gradient fills intended to make a surface appear shiny or metallic can end up looking matte or 'brushed'. One way of improving specular highlights in a Deneba *Canvas 8* graphic is to render the artwork to bitmap using the Camera tool, then immediately call up the Levels dialog window (Adjust submenu under the Image menu). Drag the shadow and highlight sliders inwards to enhance the apparent shininess of the fills.

43

3D wireframes

Give iconic artwork a 3D 'tech' feel in Deneba *Canvas 8* by showing the wireframe construction of solids. To do this, create an extruded solid from a vector object in the normal way using the Extrude palette, then Convert To Paths (Paths submenu under the Object menu). Then apply a colour to the stroke but set the fill to 'no fill'. The result is a fully see-through wireframe.

44

Bitmap to vector clip art

Place a photo image on a Deneba *Canvas 8* page, then apply the Posterize filter (Adjust submenu under the Image menu), set to only four or five levels. Trace around each of the posterized areas using the Auto Curve tool. Fill each area with a matching colour from the original bitmap, remembering to remove the stroke. You have just created pro-class vector art from a photo in a few minutes.

45

Quick metallic text

Create shiny metallic text quickly in *Canvas 8* by starting with 50% black text and applying the Bevel effect from the Stylise submenu in the SpriteEffects palette. Now add another SpriteEffect, this time choosing curves. Adjust the curves in the dialog window to a steep rollercoaster shape, producing a sharp, contrasty illusion of shininess. Put a duplicate of the original text over the top, fill it with a multistep colour gradient, and apply the Overlay Transfer Mode to blend it down into the shiny text.



Canvas 8: SpriteEffects can add a bevel to text, then adjust the RGB curves to enhance the metallic look, then apply a gradient colour overlay, but the text always remains editable.

47

Wizaerd fun

The Wizaerd's Realm Website is well-stocked with free goodies for users of Deneba *Canvas 8*. These include a mix of JavaScripts, WScripts and VBScripts for the program, plus tutorials and a large quantity of downloadables such as gradient palettes, calligraphic pen strokes, symbols and automating macros. It's definitely worth a visit at [w] www.wizaerd.com.

48

Airbrush shadows

Try to use Deneba *Canvas 8* SpriteLayers instead of inked brushes to produce airbrushed effects. For an orange object, for example, create a duplicate in crimson and send it behind. Click on the orange object with the Sprite tool and then apply a low-pressure Airbrush to carefully strip away the colour to reveal the crimson beneath for shadow areas. Because you are airbrushing a mask rather than ink, it's easy to correct your mistakes.

49

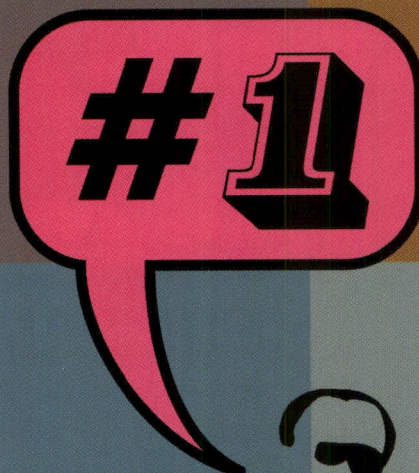
Serious forums

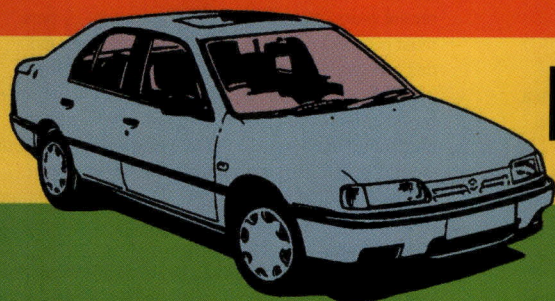
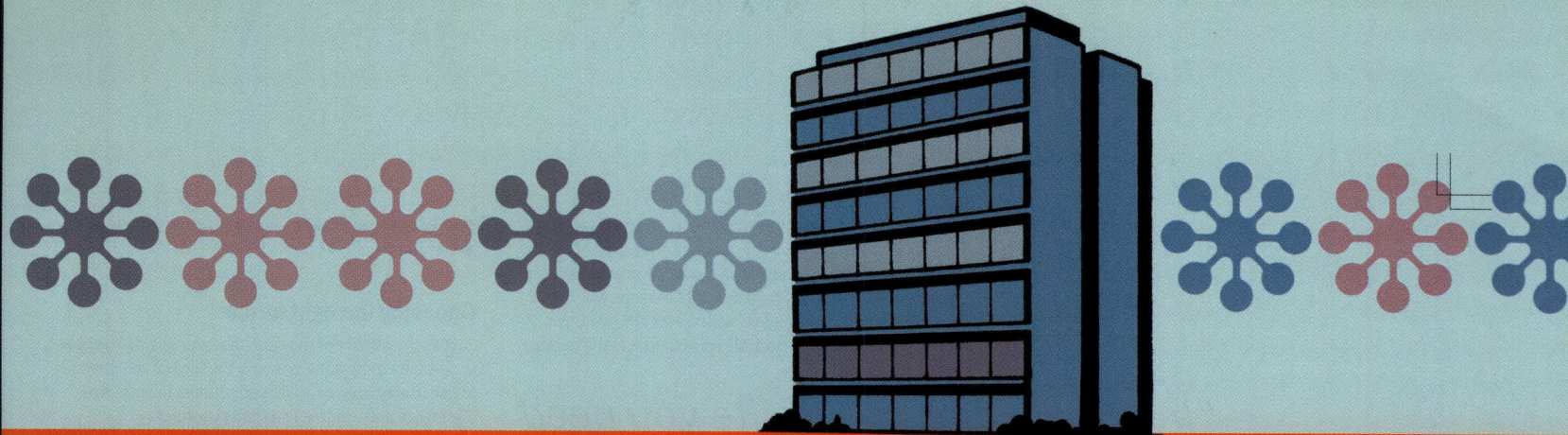
As well as presenting a good number of how-tos for *Canvas 8* beginners, the Deneba Website hosts a thriving, unmoderated user forum to encourage users to exchange ideas and assist each other with unresolved *Canvas* issues. This is a rare example of a forum devoid of irate postings, so it suits people who are serious about *Canvas*. Go to [w] www.deneba.com/support and click on the Online Support Forums link. Another good forum is Wizaerd's Realm at [w] www.wizaerdsrealm.com/forum.

50

The Canvangelist

Whether you're trying to develop your Deneba *Canvas* skills or merely evaluating *Canvas* as a possible purchase, you should find The Canvangelist helpful. It's a freely downloadable e-zine in Acrobat PDF format, with each issue following a particular design theme. Issue 9 should be out any day now. Check it out at [w] <http://commfaculty.fullerton.edu/mbedford/canvangelist>. **ca-s**





Powerful portfolios

You want to snare your first job; you want to change jobs; you want to win your first commission; you want to pick up new clients. You want a portfolio...



Whatever stage you are at in your design career, you need a portfolio. A portfolio that presents your work effectively, clearly and professionally is a must if you are to succeed in the creative world.

The key component in your armoury — this vital weapon can make or break you. It really is as simple as that.

Of course, it's no longer as simple as just popping down to your local art store and pulling a portfolio off the shelf. Portfolios come in all shapes and sizes and, of course, in all manner of formats too. What best suits your needs and the needs of your clients? Are you thinking: traditional leather-bound affair, CD-ROM of all singing and dancing motion graphics, or online folio that can keep clients right up to date with your latest work? Fear not, we look at the range of possibilities open to you — whether a lone illustrator out for his/her first appointment or small design business looking to create a Web-based portfolio that really is the business, it's all here... >



Expertise provided by illustrator, designer and educator Lawrence Zeegen. Lawrence has produced commissions for numerous newspapers, magazines, design companies and advertising agencies in the UK, Europe and the USA. He is Academic Programme Leader for Communication and Media Arts at the University of Brighton. View his own portfolio at [\[w\] www.zeegen.com](http://www.zeegen.com).

Let's start by getting one thing out of the way: there are no right or wrong ways to put together a portfolio. There are good and bad ways though. A great portfolio can get you noticed for all the right reasons whereas a weak portfolio can get you noticed for all... well, you get the picture. Your portfolio is your link to the outside

"In your first portfolio site you need to consider design, build and speed of download"

world. It is often the one and only location where a body of your work can be viewed together unless you're lucky enough to have a publisher who'll dedicate an entire book to your product; think Carson, think Tomato, think Designer's Republic. Think again.

What goes in and what stays out...

What makes a great portfolio? Opinions differ here, but one point on which everyone agrees is that it should contain great work. Put in only the best work you have produced; do not pad out your portfolio with examples that you are not pleased with, not proud of or else be prepared to be offered work that you won't be pleased with or proud of. Nick Gant of Brighton-based 3D design company Bobo Design agrees: "Show only what you are good at. Edit out the weakest work!" Martin Cox, director of London design agency Blast, reviewing his own approach to building the right portfolio offers the following advice: "It really makes sense to only show the kind of work that you want to get from new clients, so put in work that is memorable!"

When putting together your portfolio it is crucial to consider a number of objectives. It pays to think carefully about your audience. Who do you want to view your work? Where do you want them to view your work? How do you want them to view your work? What do you hope to gain from your work being viewed? All fairly straightforward questions, you may think, but your answers could lead to potentially very different outcomes.

How you set up your portfolio differs if you are looking for permanent employment as opposed to a freelance project or if you are a college-leaver rather than a professional with ten years' experience. Whatever your situation, whatever your goal in showing work; make sure it does the right job. It makes sense to kick off with a cracking project — it may be one that jumps off the page or screen, it may be vivid in colour or it may be a recognisable piece. Whatever you choose to open with, it should be one that sets the mood for the viewer. The same goes for your closing image or project — how do you want to be remembered? End on a high note!

Select the amount of work carefully that is to make up your folio; don't show too much or too little. Most interviewers or potential clients will have a limited time to view your work, so keep it snappy but don't skip important projects. And if you are a recent graduate, don't be tempted to include every single life drawing that you've ever done. There is a fine line to the right amount of work to show — be prepared to

modify, take projects out, and add projects until you get it right.

Choosing the right format

Just as the quality of the work that you decide to show is crucially important, so too is the format you choose to use. Being able to guide your clients to your own digital portfolio online is a really useful way of allowing them to see work immediately; gone are the days when they have to wait patiently for a bike courier to trek across town or further. The dramatic rise in recent years of illustrators leaving London — where most publishing houses, advertising agencies and design companies are based — to set up elsewhere while clients view Web-based work rather than print-based is evidence of the uptake of this form of portfolio. It matters less and less where you base your studio. Most illustrators email final artwork or can burn it to CD and arrange next-day delivery anywhere in the country. This eliminates the need for being based on the client's doorstep.

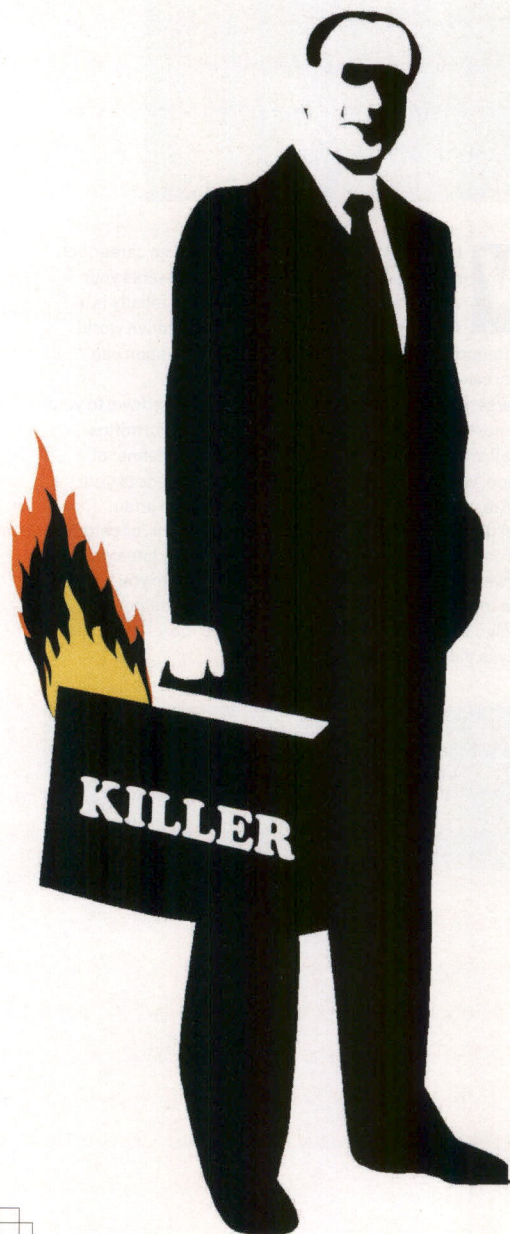
When considering the creation of your first portfolio Website remember a few key issues. The quality of the design, build and speed of the site are all vital to consider. The information that you provide is important too — should your portfolio site include a CV or short biography? Should you give a little information about the projects/examples that you include? It goes without saying that your site should be easy to navigate because people will click off if expected to work too hard — remember, you are selling your work and not your state of the art, cutting edge Web skills, unless of course that is what you do for a living!

It is worth pointing out that, once your site is up and running, nobody will know about it unless you tell them. Phone, email, send cards, shout from the rooftops; just make sure folk know. Another key method of ensuring traffic to your site is through useful links. Members of the Association of Illustrators can get a link from the AOI's site — check them out at [w] www.theaoi.com.

Other ways of producing portfolios that are more than just static folders sat on the floor of your studio include CD-ROM and DVD based interactive pieces. The bonus of working this way is that movies and sound can be included and no 56K modem is going to slow down the process of viewing your work. Portfolios can be tailored for individual clients and far more control rests with you, the creator of the work. Nick Gant reflects on the ethos that underpins Bobo's numerous digital portfolios: "Remember, it is a chance to manipulate the way people view your work. You have the control right from the start as to how your work is perceived!"

Keep your portfolio up to date

Now that you've got your portfolio — with selected work worthy of making an appearance in a suitable format — the least attractive aspect of the process comes into play. The most overlooked angle in portfolio management is keeping the thing up-to-date. Rethink, re-edit, re-evaluate and reorganise on a regular basis to keep your online, offline, digital or print-based portfolio looking as good as the day you created it. Of course, this takes time and energy but is essential in keeping your clients informed.



Portfolio showcase

PRINTED PORTFOLIO — BLAST

Martin Cox and Colin Gifford (Giff) are directors of London design agency Blast. They formed Blast in 1996 but for seven long years managed to resist the temptation to create a portfolio that was any more than a collection of printed projects in a traditional leather binder. "We were scared of ourselves as clients," explains Martin, "as it has taken this long before we really knew what we wanted to say about ourselves!" Now, it seems they have got the tempo spot on.

Launching 'Design — how do you do?' an amusing A2 folded promotional portfolio recently, that includes examples of 28 wide-ranging jobs for clients that span the BBC, The Royal Mail, D&AD and NESTA, Blast has established itself as a big hitter. Printed in a run of 2000 and with very obvious stylistic links to its Website at

[w] www.blast.co.uk, this mini-folio is, according to Martin, a brand bible for who they are. Blast's approach has not gone unnoticed. Martin Usborne, Creative Director at Tronjii, for whom Blast created a corporate identity explains: "What drew us to Blast in the first place was its sense of humour and lightness of touch that was coupled with a serious understanding of concept and style." Quite.

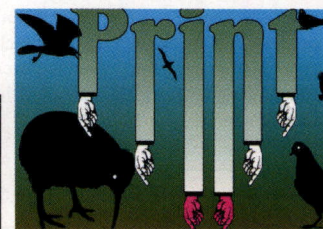
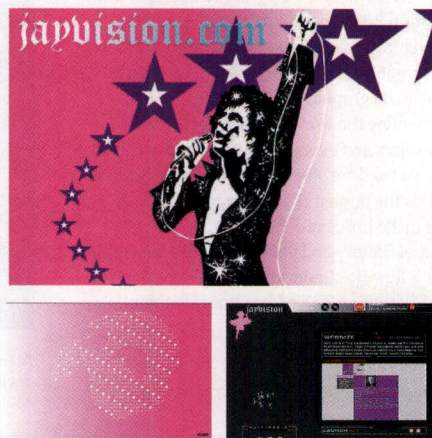


Blast has managed to resist the temptation to create a portfolio that was any more than a collection of printed projects in a traditional leather binder.

CD-ROM — JAYVISION

Jayvision is Jason Thomas. Jason is a designer for both print and Web and a pretty dab hand at illustration too. After graduation in June 2000 he worked for Red Design in Brighton before moving onto DNA in London, deciding to quit work for a while in mid 2001 to travel the globe. After spending six months in Asia and a further six in New Zealand and Australia, Jason returned to the UK with a huge body of photographic and video work, much of which he was burning onto CD and mailing home to himself while on his travels.

Back in the UK and determined to return to full-time employment, Jason has re-launched [w] www.jayvision.com with a complete re-design and has created a more in-depth off-line version. Given that Jason wants the work to run locally at a smooth rate, he has restricted the maximum size to 200MB although this still allows for far greater use of sound and moving images than the online version could cope with. Jason explains why the CD is his first choice for a portfolio presentation: "I find the CD-ROM a flexible platform to express both visual and typographic elements to a captured audience. The very act of inserting the CD is commitment enough, so from then on it's lights, camera and action!"



The CD-ROM is a flexible platform to express both visual and typographic elements to a captured audience. The very act of inserting the CD is commitment enough.

Traditional portfolios

With the evidence of successful digital portfolios it may well seem that the traditional portfolio is dead. Well, think again or, at least, think again in many circumstances. Plenty of clients do still need to see work in print, especially if print is the medium that your work is to be reproduced in. At an interview or presentation, unzipping a portfolio takes no technical support whereas turning up with a

CD requires a little more. The pace that the interviewer can view your work in his or her hands with a traditional portfolio and they may prefer that. If your clients have to show your work to their associates, using something straightforward is risk-free, as there can be no compatibility problems.

When it comes to a bound portfolio, buy the very best that you can afford. Choose leather over plastic and choose perfectly

clear acetate sleeves over wipe-clean thick plastic ones. The best quality portfolios are manufactured by Press Book Prat and Panodia and can be bought at Cowling and Wilcox on Broadwick Street, Soho, London or ordered though [w] www.cowlingandwilcox.com. Cowling and Wilcox prides itself on keeping the most extensive stock in Central London and what it doesn't stock, it can order in.

WEB-BASED/ILLUSTRATION – LOOPLAND

Allan Saunders is an illustrator based in London, having started his career upon graduation of The Royal College of Art in 1999. As well as having a very impressive client list that includes Penguin Books, The Guardian and Sunday Times newspapers and Arena magazine, Allan is also the proud owner of one of the best portfolio Websites in illustration in the UK. At [w] www.loop-land.co.uk Saunders showcases a huge range of his work from commissioned final artworks to non-commissioned ideas and sketches as well as Flash movies and recent projects. As Allan explains with his tongue firmly in his cheek, "Loopland offers the latest modern stylings available in technicolour and glorious monotone."

Although Allan works mainly for print he also works for screen, having undertaken major online projects for Studio AKA and FIFA. It's the Web that offers him most freedom and flexibility. Loopland has been wowing clients since its conception in December 2000 and as a portfolio of Allan's back catalogue and most up-to-the-minute projects it does a fantastic job. "Loopland has yielded greater results than I could have expected," explains Allan, "not only has Loopland proved effective in gaining illustration commissions but it has opened up new channels and new directions that I can push my work."



Loopland.co.uk is the online portfolio of Allan Saunders. It showcases a huge range of his work from commissioned final artworks to non-commissioned ideas and sketches.

WEB-BASED/GRAPHIC DESIGN – FOUNDATION 33

Foundation 33 is, for the time being, still a relatively small unknown design studio. With projects that include the *Big Brother* identity (who could forget that eye!) and on-screen graphics and identity for Channel 4's early morning show, *R1:SE*, it is clear that Foundation 33 is going places. Formed in March 2000 by graphic designer Dan Eatock and architect Sam Solhaug, Foundation 33 describes itself as: "A multi-disciplinary studio practice grounded in a rigorous and conceptually motivated design methodology." Designing furniture, creating interiors, making art pieces are all aspects of the practice that sit equally with its graphic design work.

With such a broad range of practice, presenting the work was never going to be easy. At [w] www.foundation33.com every project and every piece of work is archived and available for the viewer or client to see. At the time of writing, Foundation 33 has been attempting to break the world record for the largest signed limited edition artwork ever produced. A million cards are in the process of being signed and numbered in a space at London's Whitechapel Gallery and the Website has been able to capture each and every day of this event. Allowing clients to see the entire range of projects has been possible because of the Foundation 33's commitment to their portfolio site.

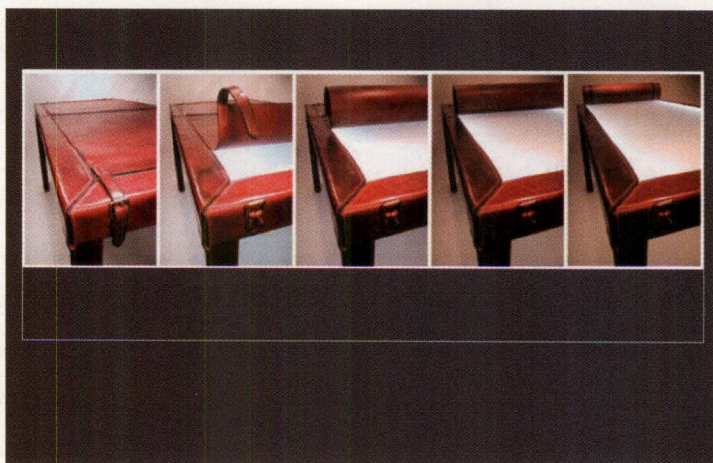


At Foundation 33.com every project and every piece of work is archived and available for the viewer or client to see.

POWER-POINT PORTFOLIOS – BOBO DESIGN

"We have no need for a traditional portfolio," announces Nick Gant of Bobo. For a 3D design company with a client list that includes The Victoria and Albert Museum, Dyson, BBC, ICI and Philips as well as George Michael and Vivienne Westwood, this still seems a bold statement. With a Web presence at [w] www.bobodesign.co.uk, Bobo is well used to directing clients to its online resource. Recently, however, Bobo has been creating tailor-made PowerPoint presentations that are built around the needs of each and every client. PowerPoint portfolios are either small enough to email directly or with larger files that include 'fly-by' video shots of 3D spaces, burnt onto CD and thrown in the post.

"Everyone seems to have PowerPoint," explains Nick, "we are presenting work to clients that may not be designers themselves and so have no desire to try and run applications that they have never heard of." With a template designed and created in PowerPoint that echoes the look and feel of the Bobo Website, Nick is able to drag and drop different projects into the portfolio in a matter of minutes. Armed with a digital camera/camcorder, he shoots projects in progress too, giving clients a real feel of the process. "It is all about giving a far more tailored and individual service to our clients," reflects Nick, and who could argue with that? **CD-R**



PowerPoint presentations are either small enough to email directly or with larger files that include 'fly-by' video shots of 3D spaces, burnt onto CD and thrown in the post.

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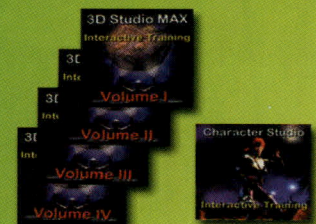
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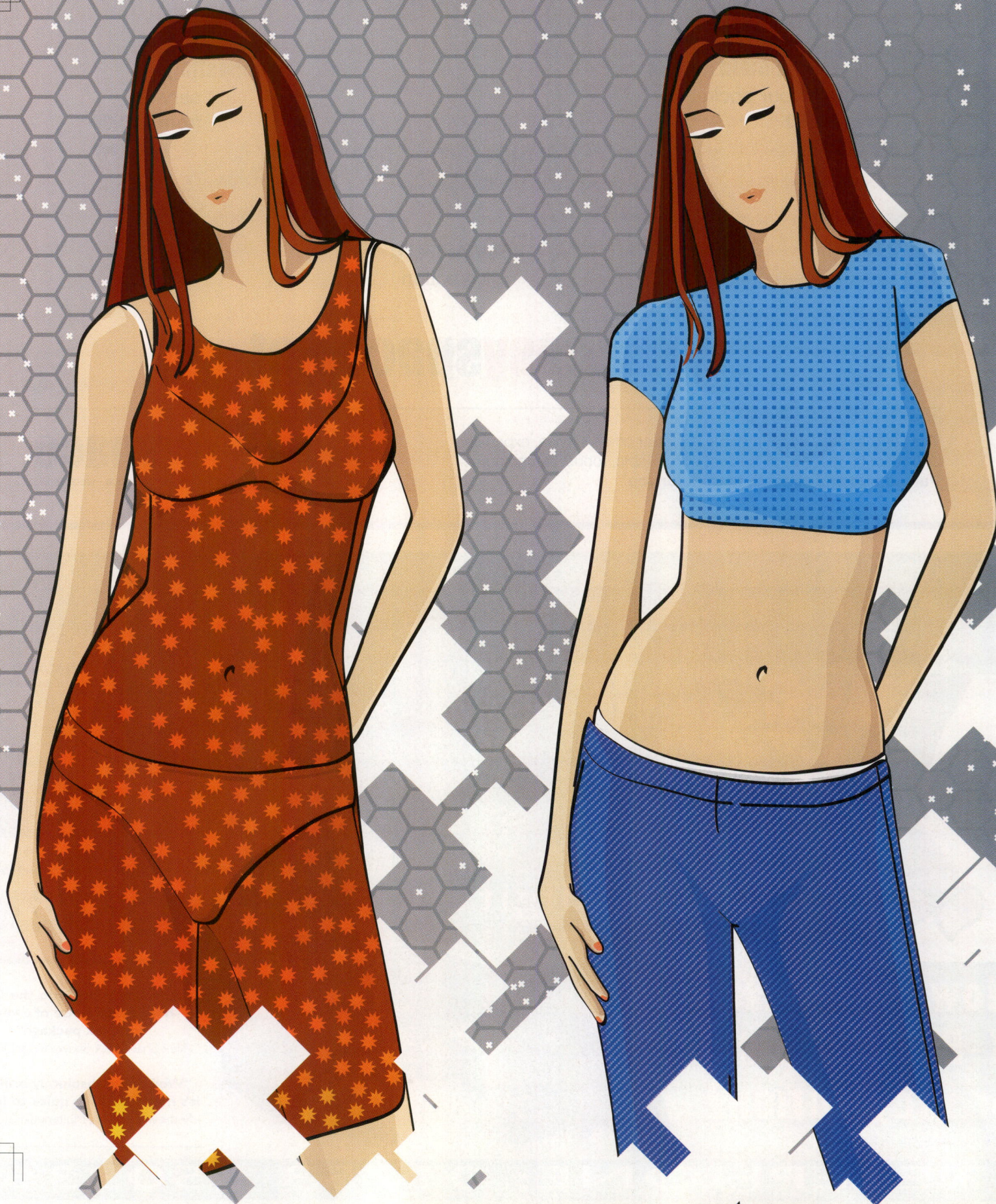
"Absolutely fantastic, the CD's have made sense of a very complex package"

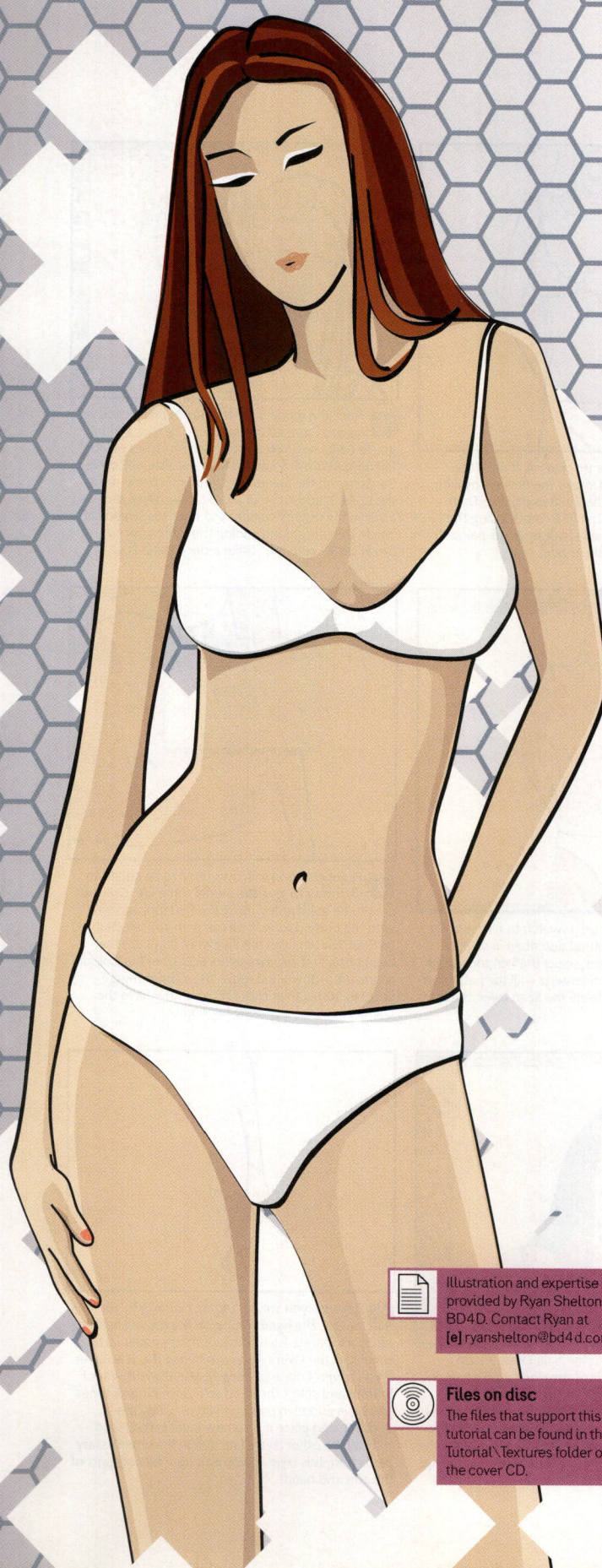
Alex Shaw, Alex Shaw Art & Design.

"Well done, absolutely brilliant, it's made MAX so quick to learn"

Andrew Gribbon, Multimedia Student.

TELEPHONE: 01753 550336





Building and using textured backgrounds

Use *Illustrator 10* to create repeating patterns using swatches and more random repeats using the new symbols feature...

In this tutorial you will create a fashion style drawing. You'll start off by adding a realistic brush stroke to the outlined path using *Illustrator's* built-in brushes, to give the model a realistic looking hand-painted outline. The model will then be 'brought to life' by adding skin tones and clothing. This is achieved by altering the transparency of drawn paths to effectively add highlights and shadows. Clothing the model is made simpler by altering the various colour modes and opacity of the shapes overlaying the model's skin tones, which means the highlights and shadows

you will have created for the skin tones are re-used.

Repeat patterns, like those printed on fabric, will be produced and applied to shapes as easily as you would add colour. Applying more random textures and repeat patterns using Adobe's latest version of *Illustrator* is achieved by using the new symbols feature. This tutorial will take you through the process of creating and using symbols together with colour modes to create effects that would otherwise have taken a lot more work to produce using older versions of *Illustrator* or other vector graphics programs. Let's get stuck in... >



Illustration and expertise is provided by Ryan Shelton of BD4D. Contact Ryan at ryanshelton@bd4d.com



Files on disc

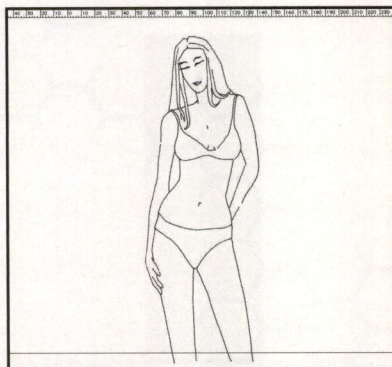
The files that support this tutorial can be found in the Tutorial\Textures folder on the cover CD.

Part 1: Drawing the model

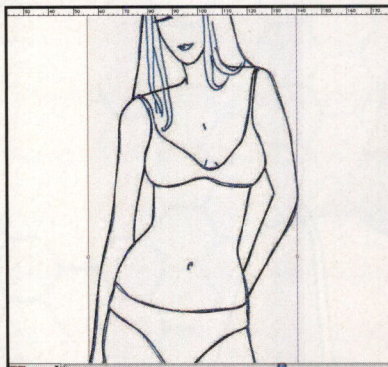
Tracing the body and adding highlights in *Illustrator 10*...

Tracing tip

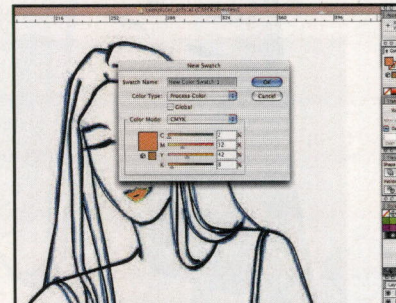
To achieve a drawn look for outlines, leave some spaces between paths as you outline the model scan.



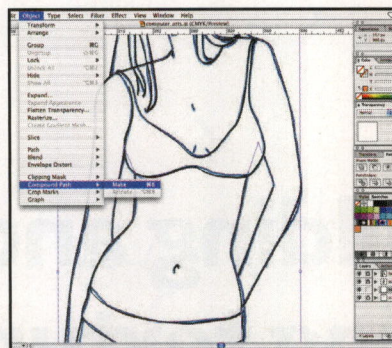
1 Open *Illustrator 10* and create a new document (File>New). In the dialog box that appears, select the CMYK colour mode and change the artboard size to A3 (420mm x 297mm). Next place the scan (File>Place) which can be found in Tutorial\textures\model.jpg).



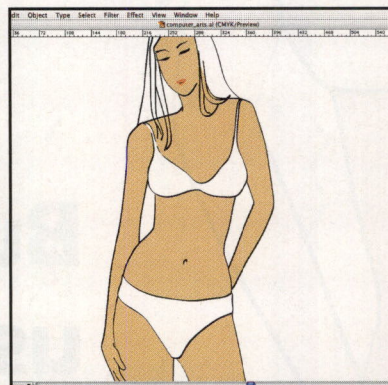
2 Create a new layer (re-naming it Outline), trace the scan and stroke the new paths with the 10pt oval brush in the Brushes palette. Then reduce the Stroke to 0.2px (0.07mm). Using this brush stroke creates a fairly realistic hand-painted effect to the outline of the model.



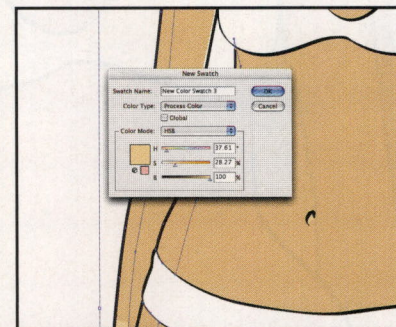
3 Trace the model's facial features on a new layer named Face, adding colour to her lips as you go. To add a new colour go to the Swatches palette, fill the lips with any swatch in the palette, select New Swatch from the Swatches palette menu and drag the C, M, Y and K colour slides around until you achieve the desired colour. Also trace the strands of hair in the foreground adding the same 10pt oval brush stroke with the Stroke reduced to 0.2px.



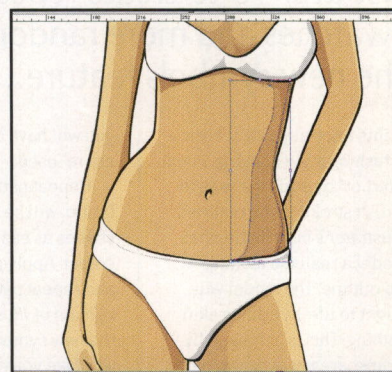
4 Add a new layer and re-name it Body. Drag it below the Outline layer, locking all the other layers to avoid intercepting any of the other paths. Trace your original outline creating one closed path. To punch out the paths between the arms and body, select all three closed paths and then go to the Object drop-down menu and select Compound Path>Make.



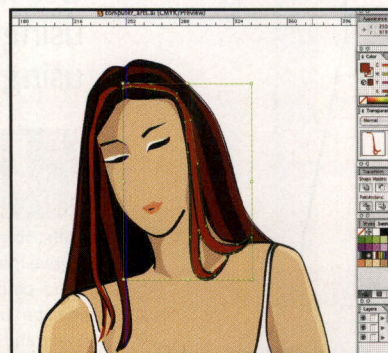
5 Create a skin-coloured swatch to fill the body path using the method described in step 3. Staying on the Body layer, select the Pen tool again and trace the model's underwear – fill the paths with the white swatch and delete the Scan layer as it is no longer needed.



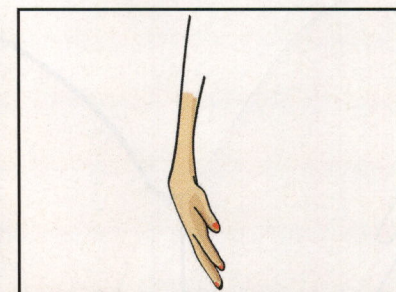
6 Highlights and shadows need to be added to the body to give the model some life. Draw an area to be highlighted using the Pen tool and fill it with the body colour. With the path still selected, go to New Swatch from the Swatches menu. In the dialog box that appears select HSB from the Colour Mode drop-down and move the B (brightness) slider to 100% then click OK. You now have the colour for all the skin tone highlights.



7 Do the same for the darker areas except, when adding your darker skin tones swatch, play with the H (Hue) and S (Saturation) bars. Using all three sliders you can avoid creating a dull fleshy colour. To make the mid-tone between the flesh and darker colour, use the Transparency palette to knock back your secondary shadow paths to 45% opacity.



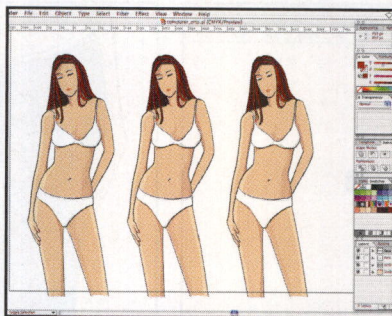
8 It's time to sort out her hair. Draw a path around the outline of the illustration's hair on the Body layer, fill this with a suitable colour and send it to the back (Object>Arrange>Send to Back). Do the same for the dark area of colour behind the neck. Next add highlights to the hair. Now select the Face layer and draw around the paths of hair falling over the face, selecting new colours for each path.



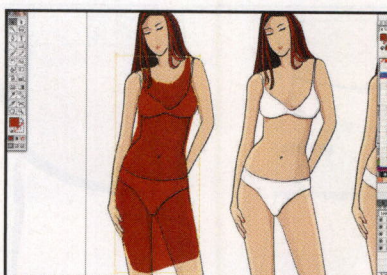
9 Because you will be adding clothing to your model, the hand resting on her leg will need to be on a separate layer to make things easier later. Unlock all the layers – you can delete the Scan layer if you haven't done so already. Use the Arrow tool to drag and select the hand area, including all tones you have added in previous stages. Copy the selection and place it on a new layer called Hand. Hide all the other layers and delete the unnecessary paths from this layer so you end up with only part of the arm and hand.

Quick strokes

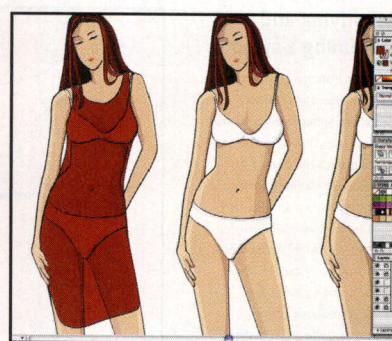
To quickly add the same stroke to the Dress Outline layer select the Eyedropper tool and with the dress outline selected click on the model outline. This is a useful shortcut for adding the same fills to objects and can even be used for type!



10 Turn visibility back on for all layers and select the entire illustration. Copy the selection (Edit>Copy) and Paste in Front (Edit>Paste in Front). Now move the pasted image over to the left or right of the original holding down Shift to keep it on the same axis. Repeat this to create a third instance of the illustration.



11 Add a new layer above the Outline layer and name it Dress. Now draw the outline of a dress over one of the models and fill it with a burnt red colour. To achieve a see-through material, select the dress and change the colour mode in the Transparency palette (Window>Transparency) to multiply. You might like to test the other colour modes while you are there to see what other effects can be achieved.



12 Duplicate the Dress layer and select None from the Swatches palette to clear its fill. Now add the same brush stroke you added to the Outline layer – 10pt oval with a stroke of 0.2px (0.07mm). Be sure to set the Colour Mode for the Dress Outline back to Normal in the Transparency palette.

Part 2: Creating and using symbols

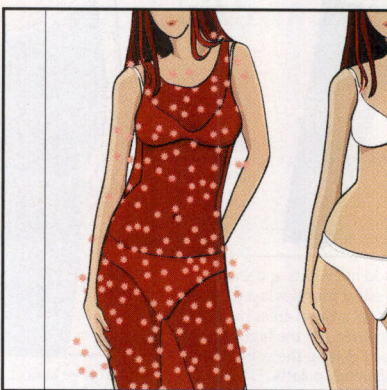
Giving your model a patterned dress...

Sprayer brush

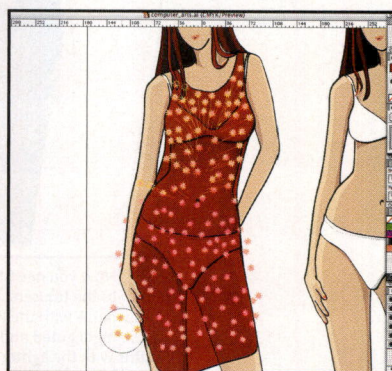
Once you have created a symbol, you can use the Symbol Sprayer tool to create multiple instances of the symbol by spraying the artboard. The multiple symbols can be scrunched together, separated, shrunk or enlarged and rotated using the other symbol tools. Transparency can also be achieved by spraying over the areas you want to make transparent.



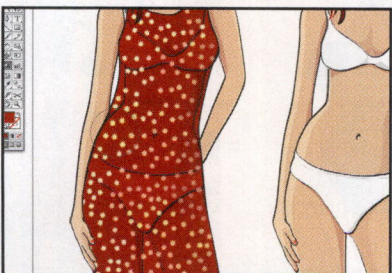
1 Adding a pattern to this dress can be done by using symbols. First create a symbol. Click and hold down the mouse over the Rectangle tool in the Tools palette and select the Star tool from the bar that pops out. Click and drag the cursor over your art board while tapping the up arrow key on your keyboard to add points to the star. Release the mouse when you're happy with the size of the new star. Change the colour of the star to a pale red, ensuring that its Colour Mode is set to Normal. Drag this star into the Symbols palette (Window>Symbols) to create a new symbol.



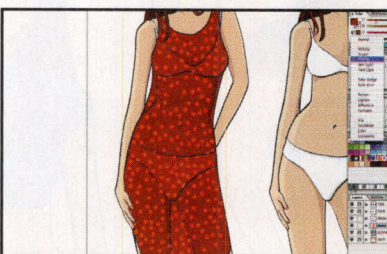
2 Now select the Symbol Sprayer tool and your new symbol to begin spraying the pattern onto the dress. Don't worry about spraying over the outline too much as this will be altered in the next step. Go nuts!



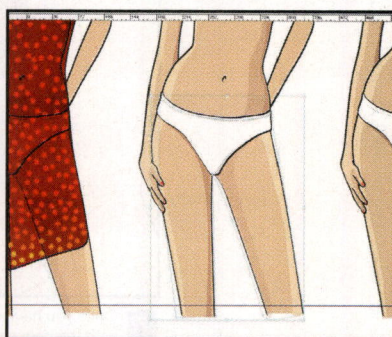
3 To push all the sprayed symbols in to the Dress outline, select the Symbol Shifter tool by holding down the Symbol Sprayer tool and selecting it from the Tools palette. Now, with the symbols you have just sprayed selected, simply click and drag the stray symbols back in line.



4 To add a more natural material look to the pattern, some of the symbols will need to be lighter than others. To do this select the Symbol Stainer tool from the Tools palette and choose a pale yellow colour from the Swatches palette. Now spray over some of the symbols staining them with the lighter colour.



5 Once you're happy with the result, change the Colour Mode for the symbol pattern to Overlay in the Transparency palette – this gives the pattern a transparent look and allows the body outlines and highlights to show through. Repeat the above steps to create another symbol pattern to the bottom of the dress using a different symbol colour or completely different symbol.



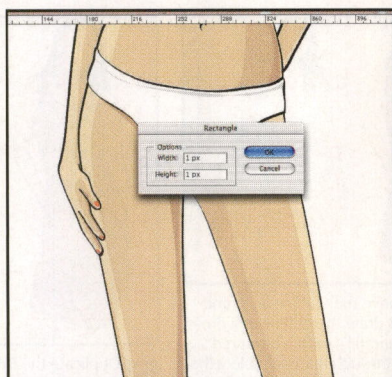
6 Next, you're going to clothe the second model. Create a new layer and name it Hips. Select the Pen tool again and start drawing a pair of trousers around the outline of the model.

Part 3: Using patterned swatches

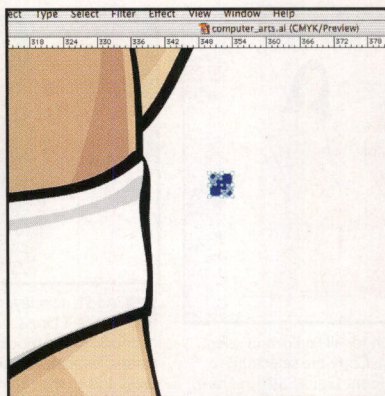
Decorating clothing with repeatable graphics from the Swatch palette...

Modifying and redefining a symbol

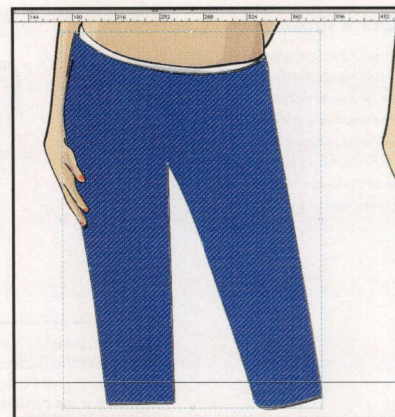
Select an instance of the symbol on the artboard and click the Break Link button in the Symbols palette. Select the symbol to be edited in the Symbols palette, and choose Redefine from the Symbols palette menu. You can also Option-drag (Mac OS) or Alt-drag (Windows) the modified symbol on top of the old symbol in the Symbols palette. The symbol is replaced in the Symbols palette and is updated in the working file.



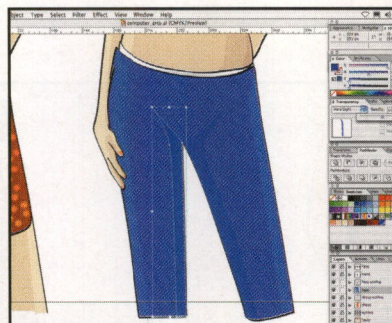
1 To add a repeating pattern to the trousers, first make a repeatable graphic that you can add to your Swatches palette. To create the simple repeat pattern used, select the Rectangle tool and click anywhere on the art board. In the dialog box that pops up enter a value of 1px into both the Width and Height fields then click OK. Fill this square with a light blue.



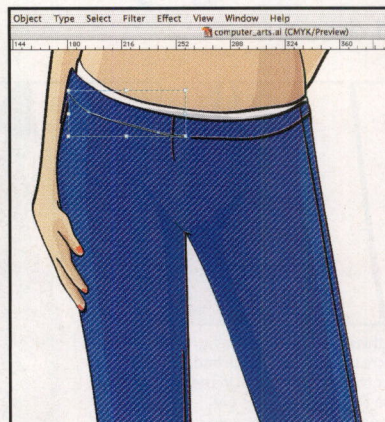
2 Duplicate this square three times so you have a total of four squares to work with. Now draw a rectangle with the dimensions of 4px wide by 4px high. Fill this new square with a darker blue and send it to the back (Object>Arrange>Send to Back). Arrange all the squares to form a repeatable object and drag it into the Swatches palette.



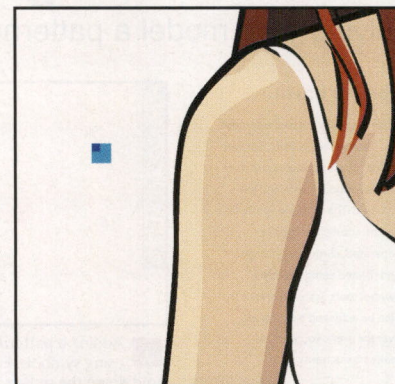
3 Select the trousers outline you drew in Part 2, step 6 and fill it with the new swatch pattern in your Swatches palette. Duplicate this layer, renaming it Hips Outline, and use the Eyedropper tool to add the same brush stroke to the trousers outline as the rest of the illustration.



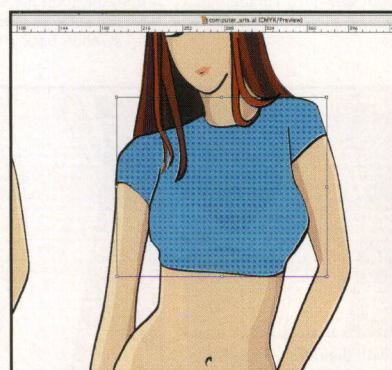
4 Now you need to add highlights and shadows to the trousers. Re-select the Hips layer and draw paths with the Pen tool around areas needing to be highlighted and darkened. Fill the highlight paths with the lighter blue – setting the colour mode to Soft Light in the Transparency palette. Fill the darker paths with the dark blue and set the colour mode to Hard Light with an opacity of 60%.



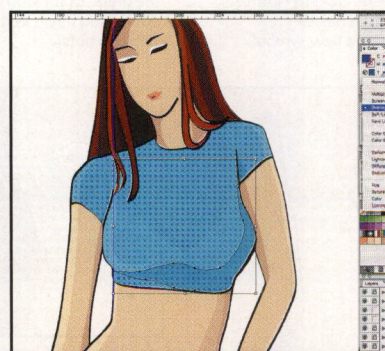
5 You've almost completed the trousers now; all that remains is for you to add some brush strokes to the Hips Outline layer to finish them off.



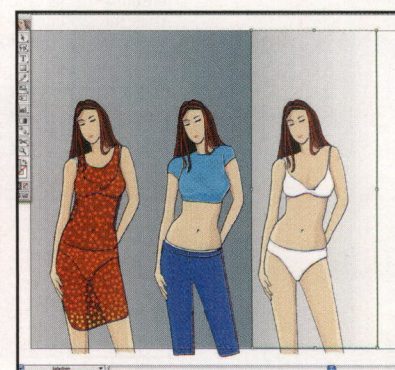
6 To create the second model's top, repeat the steps above but make a new Pattern Swatch using only two squares. One at 2px by 2px filled with a dark blue and a second larger square at 5px by 5px filled with cyan.



7 Once you have outlined the top and filled it with the new patterned swatch, set the colour mode to Hard Light – this allows part of the underlying model to show through the top and means you don't have to add as many highlight and shadow paths.



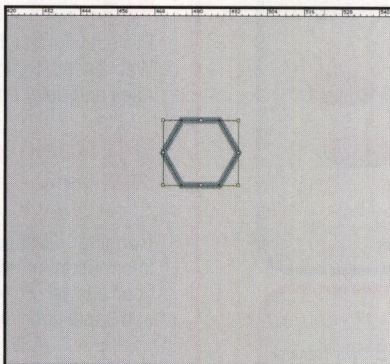
8 Add some highlight and shadow paths to the top as you did to the trousers in step 4 above. Fill the highlight paths with the cyan colour. Set the colour mode to Screen and the opacity to 40% in the Transparency palette. Fill the darker paths with the dark blue and set the colour mode to Overlay with an opacity of 40%.



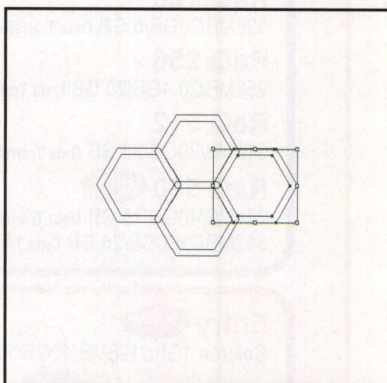
9 To finish the illustration you'll need a background. Create a layer and re-name it bg. Drag it to the bottom of the Layers palette. Draw two rectangles on this layer filling them with grey gradients by dragging grey swatches into the Gradients palette.

Part 4: Creating patterns for backgrounds

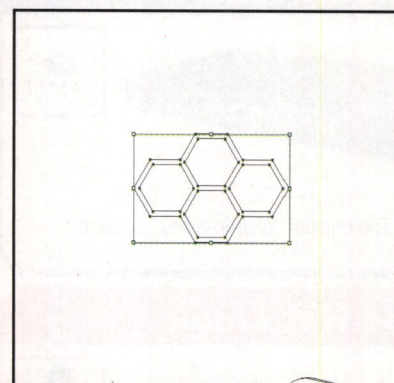
Complete your drawing with a honeycomb background...



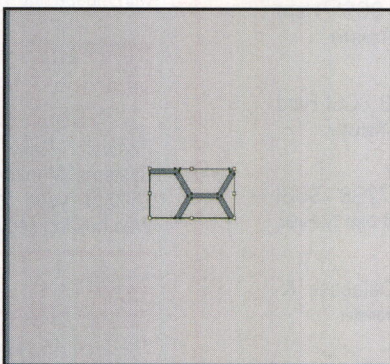
1 To add a hexagonal pattern to the Swatches palette, select the Polygon tool from the Tools bar (which is grouped with the Rectangle and Star tools) and click on the art board. Enter a radius of 12px with 6 sides into the Polygon options dialog box. Fill the stroke of the new polygon with the darker grey you used in your gradient rectangles.



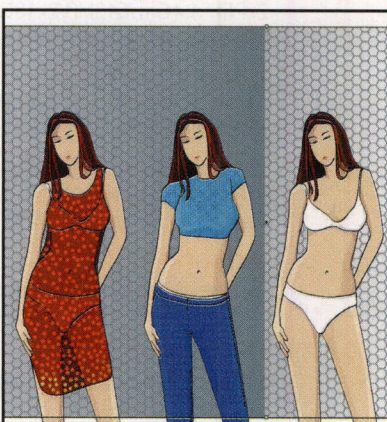
2 Outline the polygon's path by selecting Object>Path>Outline Stroke. Now duplicate the polygon four times and arrange the shapes in the way the pattern will be formed – use the Outline mode (View>Outline) to position all four polygons accurately.



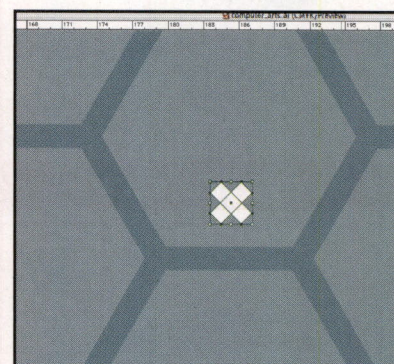
3 Select all four polygons and in the Pathfinder palette, under Shape Modes, click Add to shape area and then click the Expand button to create one unified shape. You have now got to extract a repeatable shape from this pattern to use as a pattern swatch.



4 Draw a rectangle over the pattern to mask out which area will repeat and then select both the polygon pattern shape and the rectangle and select Crop from the Pathfinder palette. Drag this new shape to the Swatches palette. You have just created the hexagonal shape for the background swatch pattern.



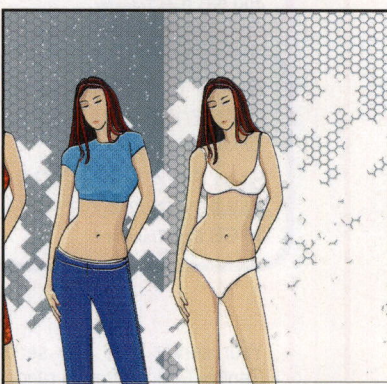
5 To add the new hexagonal pattern to the background, draw another rectangle box over the entire background and fill it with the new hexagonal pattern swatch.



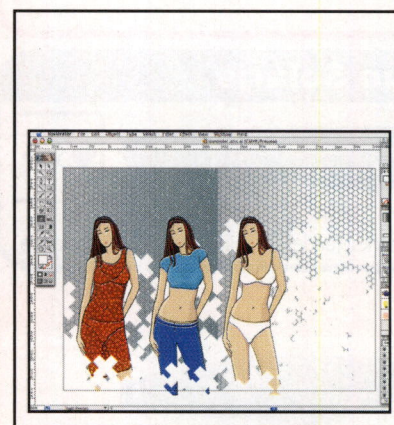
6 Now it's time to play with the Symbol Sprayer again. First, you need to create the small cross symbol. Draw a rectangular shape and fill it with white. Copy it (Edit>Copy) and paste it in front (Edit>Paste in Front). Rotate the pasted rectangle 90 degrees (Object>Transform>Rotate). Now select both rectangles and rotate them 45 degrees.



7 Add this new cross graphic to the Symbols palette. Select the Symbol Sprayer and the new cross symbol and spray away.



8 Re-select the two rectangles you used to make the last symbol and enlarge them by 2700% (Object>Transform>Scale). Add this new enlarged cross to the Symbols palette. Select the Symbol Sprayer again and spray the larger cross symbols over the bottom of the page.



9 Finally, add a new layer above all the other layers, naming it Front. Select the Symbol Sprayer for the last time and with the larger cross symbol spray over the legs of the models. **CA-S**

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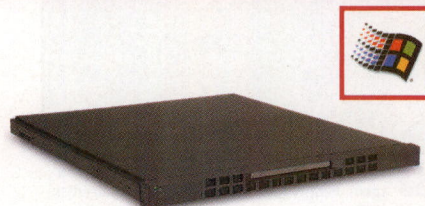
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512MB/30GB/30 GB Data Transfer **NEW**

RaQ 550 **NEW**

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512MB/2x80GB/25 GB Data Transfer

Entry **NEW**

Celeron 1Ghz/128MB/40GB/10 GB Data Transfer

Professional **NEW**

PIII 1.13Ghz/256MB/60GB/20 GB Data Transfer

Ultra **NEW**

PIII 1.266Ghz/512MB/80GB/30 GB Data Transfer

Ultra II **NEW**

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Advance

2xUltra Web Servers/Ultra II Database & Ultra II Mail Server/100 GB Data Transfer

Corporate

3xUltra II Web Servers/Ultra Mail Server/Enterprise Database Server/250 GB Data Transfer

Corporate Advanced

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Advanced SLA:

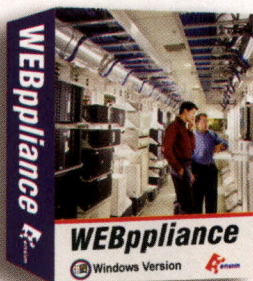
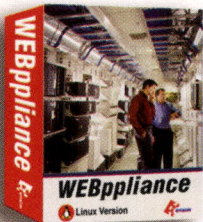
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Supon Design Group

Web or print, this Washington DC company does it all. *"We're all constantly looking for new avenues and approaches. That, in fact, is what the creative design industry is all about,"* says MD Wayne Kurie...



hen Supon Design Group was founded back in 1988, you didn't use a computer for your graphic design needs. Instead, you did all your design and design corrections by hand, and then you sent it over to typographers for type layout. Now, the company's MD, Wayne Kurie, can look back at those days with mild amusement.

"It wasn't until the early 1990s that we got our first computer," Wayne recalls. "And then we had to learn how to use it! Our new graphic designers right out of school were extremely helpful in our first forays into computer-assisted design."

The company has come a long way. Back then, Supon was a two-person graphic design team working out of Founder and current Creative Director Supon Phornirunlit's apartment. Now, there are 13 staff in its

office in Washington DC. It's also part of a wider organisation, a company called Multi-media Holdings, with which Supon Design merged in 1999. Supon works for entertainment, technology, retail and even government sectors. Names on their client list include the Newspaper Association of America, IBM Olympic Scholarship Identity, the Museum of Collectible Artefacts, George Washington University, the ZeenZone at Bankok's Central Department Store and the United States Postal Service.

"We have many clients in New York, plus others in regions and cities across the United States," explains Wayne. "We also have a very large international clientele, based largely in Asia, especially Bangkok, which includes many consumer goods and retail-oriented companies." >



The Museum of Collectible Artefacts

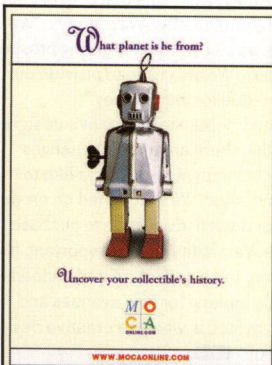
One of Supon Design's most important clients is the Museum of Collectible Artefacts. Here's how they created the organisation's print and Web campaign...

Supon's work for the Museum of Collectible Artefacts started with the development of the museum's logo design. "The objective was a strong use of colour and an immediately recognisable and friendly mark," Wayne explains. "We then developed the stationery system. Instead of just bringing in the logo and adding address and contact info, we added other graphic elements."

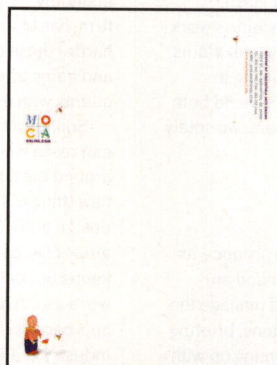
These took the form of photographic images of various collectibles. Each stationery element (envelopes, business cards, letterheads) was given its own identity in this way.

"Next we did a series of ads, almost poster-like in simplicity and graphic strength," explains Wayne. "We had to think in terms of flexibility and effectiveness."

The MOCA Website ([w] www.mocakonline.com) was a key component of the job, as the museum is all but an online business. The trick was to move the print design to the Net. "Visually, we remained very true to the identity," says Wayne. "The interactive media allowed us to build on that with the addition of more colour as well as animation and movement."



Simplicity was the name of the game for Supon's print work for the Museum of Collectible Artefacts. The key to the project was the creation of the client's logo and use of photographs of exhibits to create a sense of identity.



Business cards and letterheads are the unsung heroes of any print campaign. Again, Supon drafted in tiny pictures of collectibles to give the museum's stationery a sense of individuality and wit.



The Museum's Website is very important because it doubles as an online shop. Supon built upon ideas from the poster campaign to maintain consistency, while adding a helping of extra colour and subtle animation to add to the interactive campaign.

1. These icons are used by Supon on their Website and publications to identify programs and speciality areas. They're part of an overall marketing identity completed by the Supon Design Group.

2. For their ongoing work with George Washington University, Supon designed a distinctive print campaign to attract 15 to 19-year-olds to the university's undergraduate programme. Artwork and layout were done using *Illustrator* and *Quark* running on the company's G3 and G4 Macs.

3. Supon has created this striking imagery for New York's bid to host the Summer Olympic Games of 2012. Imagery of the universally recognised landmark – the Statue of Liberty – is used in creative, unexpected ways to portray America's largest metropolis.



1

1. Four different templates were developed for the counter panels of Ronald Reagan National Airport's food area, allowing each tenant to choose the look it favoured. These were then customised to each vendor's colour scheme and food selection, ensuring all had a unique look that fitted with the overall aesthetic.

2. The spirit and culture of Puerto Rico is captured in this vibrant new media work for Coquico. The Website is simple and playful and complements the plush toy tree-frogs that are sold by Coquico.

The company's location in Washington DC is perfect for this global outlook. "Washington is a unique city in that its economy contains virtually no manufacturing, smokestack, or blue collar industries," he adds. "There are some key large corporations headquartered here, and we are second only to the San Francisco/San Jose region in technology and Internet companies."

The company's creatives are well schooled, all holding design degrees, including Supon Phornirunlit, who attended Northern Virginia Community College and the International School in Japan. Supon Design has even collectively written a range of books on graphic design, which are available from its Website.

"Everything around us influences our work," states Wayne. "Fashion, colours, styles, movements, trends, the magazines we read, the movies we see, the people we meet. In short, nothing that we think or do is done in a vacuum. Inspiration comes from everywhere and is constantly evolving. The challenge is to be aware of these influences but not to copy or replicate them."

Apple boss Steve Jobs would be happy to learn that the company runs entirely on Macs, too. In terms of tools of the trade, it's the usual suspects: *QuarkXpress* for layout, *Photoshop* and *Illustrator*. For Web design, the company relies on *Dreamweaver* and *Flash*.

"Currently, approximately 70% of our studio's work is print, with 30% being new media," Wayne explains. "This proportion seems to fluctuate according to market and client needs. For some clients we do both 'old' and new media components. For others, we solely do one or the other."

Project management

The company follows a strict workflow to produce its client work. There's always an art director and an account manager to oversee projects and manage the designers. They lead brainstorming sessions, briefing designers with the clients' objectives, coming up with content ideas, fixing schedules and setting budgets.

Thereafter, designers sketch out their ideas and they're all discussed. Then artistic concepts are chosen for presentation. "For logos and corporate identity, we usually present five to seven logo concepts to the client," explains Wayne. The client feeds back to the manager; the manager feeds back to the design team, who then modify the work.

"Revised comps [are] presented as the next stage," Wayne continues. "For print publications, this may be a brochure's cover and interior spread; for a Website, this may be a home page and one secondary page." After client approval, of course, the work can be completed.

When asked whether the company favours print or Web projects, Wayne is diplomatic. "There's no straight answer to that," he replies. "The challenge is in the translation of the client's marketing and messaging objectives into attractive, distinctive and effective communications. The media is much less important than the effort and the process."

With this emphasis on organisation and process, it's pleasing to hear that the company has won a range of creative awards. "Our work has been recognised by such industry organisations as Art Directors Clubs, American Institute of Graphic Artist, Broadcast Design Association and the Society of National Association Publications," Wayne beams. "We're very proud of a recent accomplishment: The Advertising Club of Metropolitan Washington just awarded us with a Best-in-show award for our own Website."

Next for Supon Design Group is maintaining its corporate head in the face of the new economy's new economy. "Our business plan, like that of every similar firm, has changed dramatically," Wayne says. "We work harder these days, as all firms do, targeting prospects and going after them. We also have to provide our clients with more value for their money."

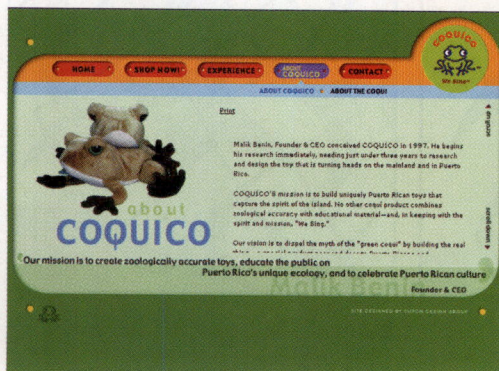
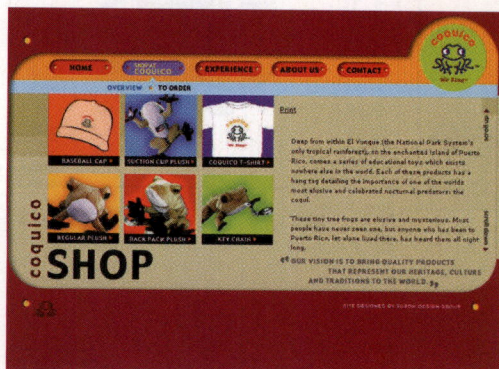
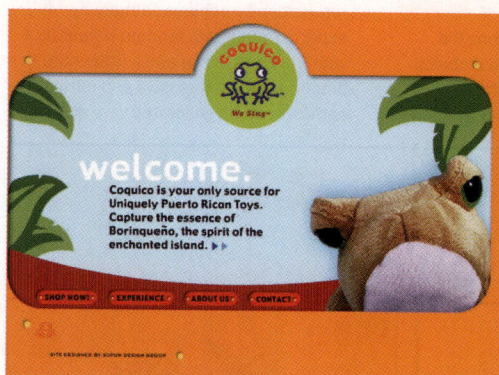
Sounds a tad stodgy, but the company's designers can rest assured that there are more challenges around the corner. "Creatively, we always like to try new things," Wayne says. "We've touched on product design and interior design in addition to our base areas of expertise. Versatility is very important. It keeps our designers fresh and interested. Indeed, we're all constantly looking for new avenues and approaches. That, in fact, is what the creative design industry is all about." **cas**



You can contact the Supon Design Group in Washington by [t] 010 33 202 835-1100 or [w] www.supon.com. Books written by Supon include: *Breaking the Rules in Graphic Design*, *Computer Generation*, *Design Directions*, *Design in Progress*, *Design Wise*, *Innovative Low Budget Design* and *International Women in Design*.

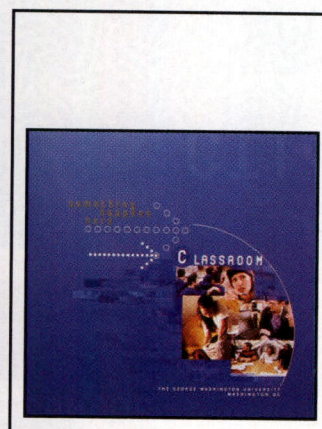
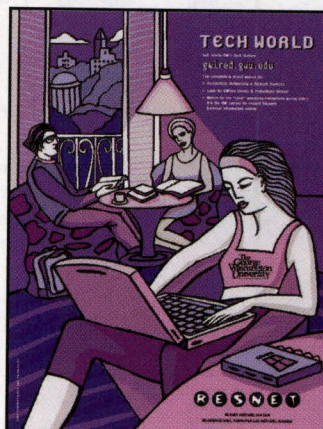


2 We Sing™



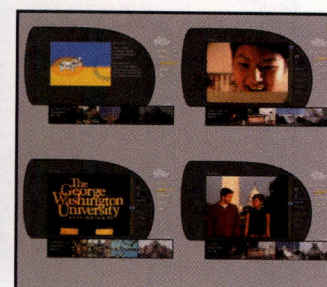
George Washington University

Supon Design Group has been working with George Washington University for nearly ten years...



1 The agency's continuing brief from the university is to attract 15 to 19-year-olds to the university's undergraduate programme. The university had two problems: uninspiring artwork and declining numbers. Thus Supon set out to design an eye-catching print campaign to enable GWU to broaden its search for students. Additionally, the agency found out that prospective students were interested in availability of technology on campus, hence the use of computer lounge imagery.

2 Supon also had to provide brochures. The agency produced a number of oversized pieces, originally with black covers to stand out from GWU's competition. Supon now redesigns the university's print material every two years. The visual effect here was achieved by multiplying layers and overlaying photographs on top of each other in *Photoshop*. It's designed to build on the target audience's appetite for all things technological.



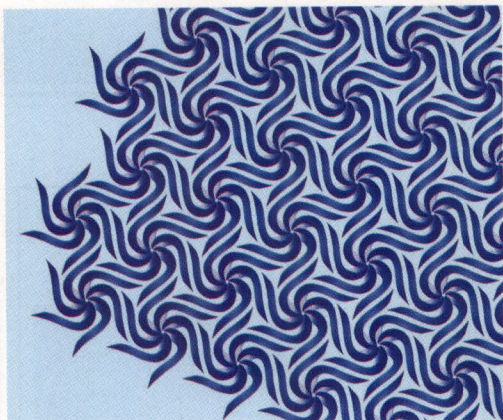
3 Supon also launched an extensive online campaign for GWU. It used elements of the print campaign, such as the layered imagery mentioned earlier. Additionally, Flash provided animation, and Supon even used audio to add to the interactive experience. It was also important to represent Washington DC, the university's location, in the material; hence the aerial shots. Supon used *Dreamweaver* for the site's layout.

4 The interactive campaign wasn't limited to the Web. Supon used both CD-ROM and screensavers to present the image of a technologically advanced campus. The agency also produced a specialist CD to attract engineering students. Predictably, *Director* was the tool of choice for this job.

Supon's advice to budding designers is:

1. Know your market and its needs, wants, values and moves. In this case, it was students of 15 to 17 years old who wanted to go to school in an urban heavily wired environment.
2. Identify a distinct message. For George Washington University, Supon wanted to say that it's a great school in an excellent city, with a broad curriculum all extensively wired.
3. Develop a graphic identity and execution that conveys the message to the target audience effectively.

"This set of take-away tips should be true for work done for any client, any industry and any format," emphasises Wayne Kurie.



Expertise provided by Chris Schmidt. You can contact him at [e] chris@track5.co.uk or [w] www.track5.co.uk.



Files on disc
A random feature demo of SymmetryWorks can be found on the cover CD.

Tiling designs in SymmetryWorks

Creating dynamically editable tiling patterns through Artlandia's *Illustrator* plug-in...

Creating effective tile designs within *Illustrator* can take hours of careful planning as seamless joins are perfected without affecting reliant areas of the pattern. Creating complex interweaving patterns to retain their seamless joins can be impossible without a little help from a plug-in such as SymmetryWorks from Artlandia.

The basic premise runs along the lines of the creation of a simple object that is then associated with the properties of a range of predetermined

tile patterns. An additional palette is introduced into *Illustrator*'s interface that gives some indication as to how a particular sequence will affect your original object. The results can then be modified as necessary in real time with any changes being applied instantly to the overall tile.

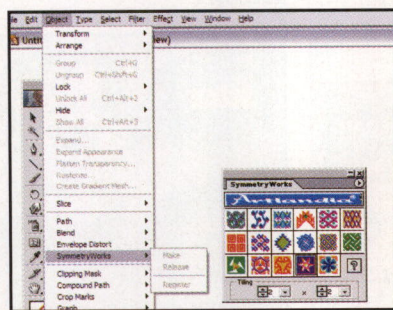
Some interesting and unexpected results can be achieved simply by experimenting with random shapes, but with a little patience and a little more practice some impressive and intricate patterns can be generated very quickly.

Part 1: Basic principles

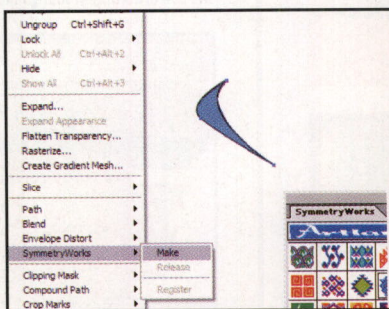
Getting familiar with the plug-in and understanding how it works...

Saving time

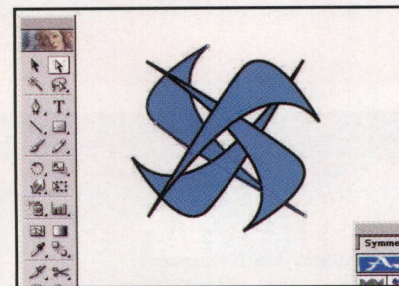
Even if you ultimately need a large tile sequence, you don't need any more than a 2x2 tiling sequence to work on the relationship between your objects. This way you can make sure your lines flow smoothly and any modifications can be made quickly and easily without needing excessive system processing. Once the effect is completed you can enlarge the results through the palette options to the required size.



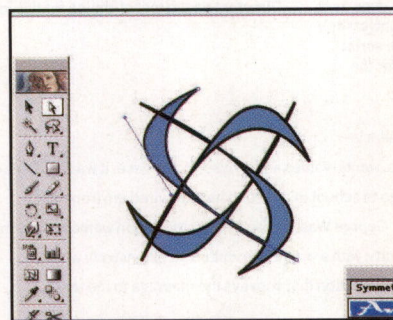
1 If you've installed the demo version of SymmetryWorks from the CD and launched *Illustrator*, you'll find the main SymmetryWorks options accessible via the Windows menu options plus an additional entry under the Objects menu.



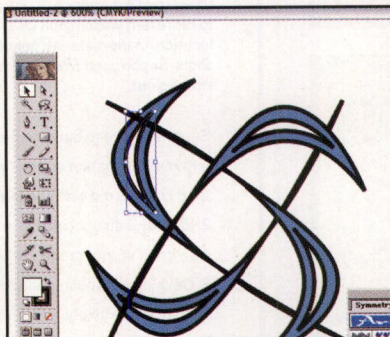
2 Create a simple shape object using either the Pencil or Pen tools. Select the object and choose Object>SymmetryWorks>Make. The plug-in automatically copies your selection applying the necessary transformation to make the initial pattern.



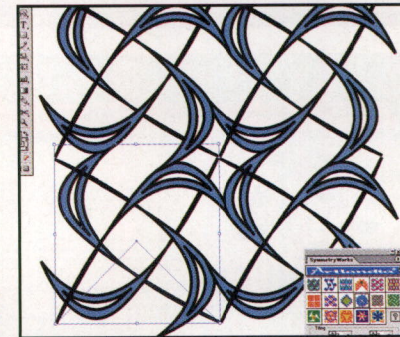
3 Your original shape becomes what SymmetryWorks calls the 'seed' of the pattern. This is replicated and transformed as necessary according to the symmetry settings chosen through the Options palette. Keep your tiling option set to 1x1 for the moment.



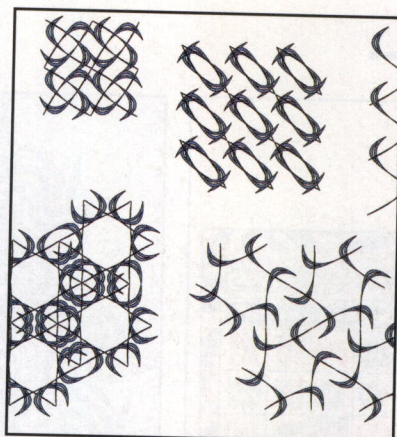
4 Use the Direct Selection tool and experiment by tweaking the original shape. You'll notice how SymmetryWorks automatically updates the entire pattern to accommodate the changes you've made to the seed.



5 Adding elements to an established pattern is similar to adding elements to masked *Illustrator* artwork. Create an object to the required location, cut it and choose the Edit>Paste Inside option.



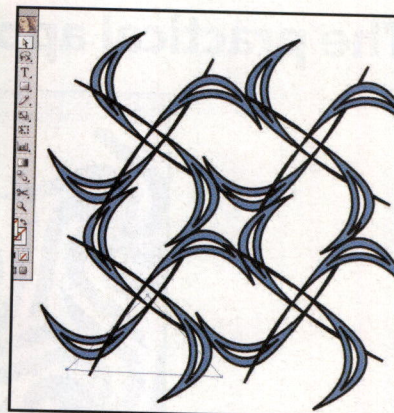
6 To see how your basic pattern tiles, raise the Tiling options to 2x2 in the SymmetryWorks palette. This replicates the basic tile and gives some indication of how your design works in context.



7 The demo version, which can be installed from the CD, only allows access to one random symmetry setting per session, but registered users will be able to experiment with different settings instantly to generate alternative patterns.



8 You may have noticed the presence of a certain no-fill, no-stroke path on top of the seed. This is known as the Control Path and serves a similar purpose as the bounding box in *Illustrator's* patterns.



9 You can use the Control Path to adjust the layout of the pattern. Depending on the symmetry, only selected anchors known as Control Anchors may be moved. The static dependent anchors will simply restore themselves if you attempt to move them.

Part 2: The practical approach

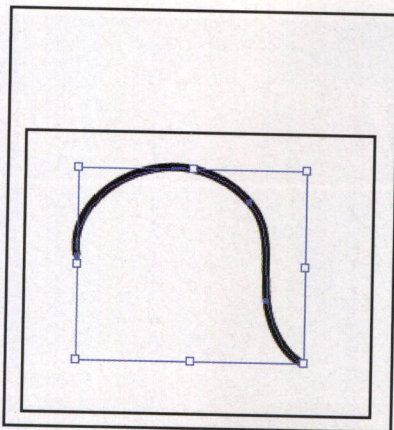
Creating a more complex tile sequence...

Outline mode

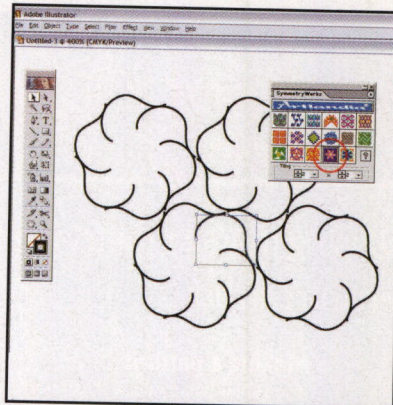
When working with complex patterns you may find it easier to work in Outline view (View>Outline). Of course this isn't always ideal, so consider opening a second window (Window>New Window) so you can get the best of both options by viewing one in preview and the other in outline.

Experiment

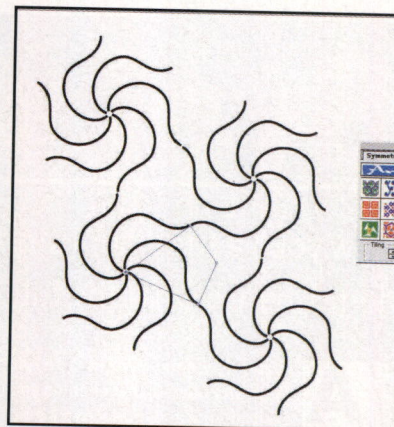
Some interesting results can be achieved by applying textured brush strokes or fills to your original seed object. And if you get stuck in a creative rut with your current creation, simply apply a few random symmetry rules for new ideas.



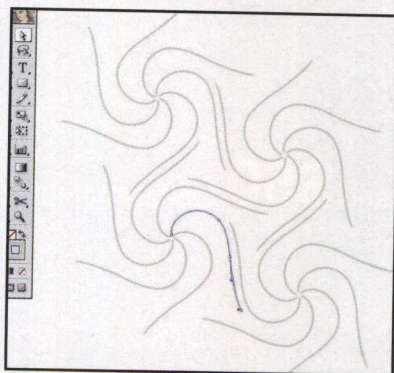
1 Create a new file and select the pencil tool. Draw a curve similar to that above and choose a stroke colour but no fill. Don't worry if the shape isn't quite the same as we can adjust that later on.



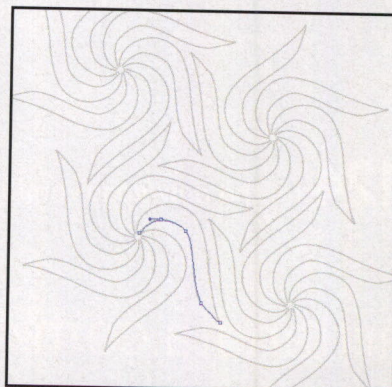
2 From the SymmetryWorks Options palette click the six rotations button shown above and make the tiling size 2x2. With the curve selected choose Object>SymmetryWorks>Make to create the basic structure of our pattern.



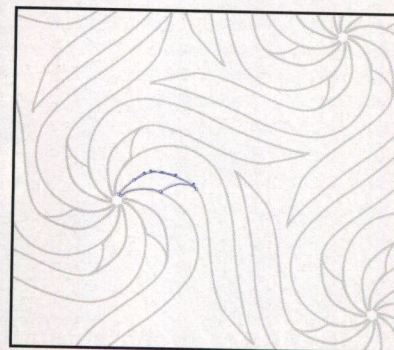
3 Adjust the layout using the Direct Selection tool on the Control Path. Drag this over to the starting point of our original curve to create the effect shown above with the central points almost meeting.



4 Edit the curve again with either the Pen or Pencil tool so that the curve has a part parallel to its image on the right. You may need to use Undo a few times as you familiarise yourself with the way SymmetryWorks dynamically updates your results.



5 Complete the curve using the Pen or Pencil tool to give the shape some body. Adjust the stroke weight if necessary to keep some distance between the generated shapes.

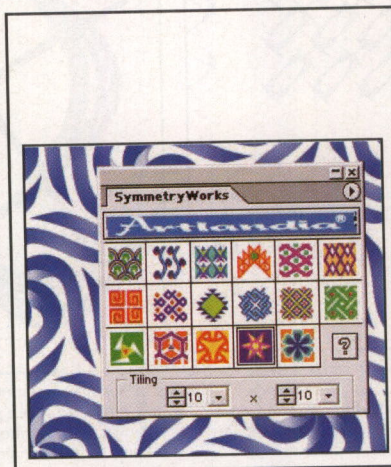


6 To give the object depth, create an extra curve to our original seed; this can be done by creating the object separately in place and using the Cut command. Then select the original seed and use the Edit>Paste Inside options to include this in the tile.

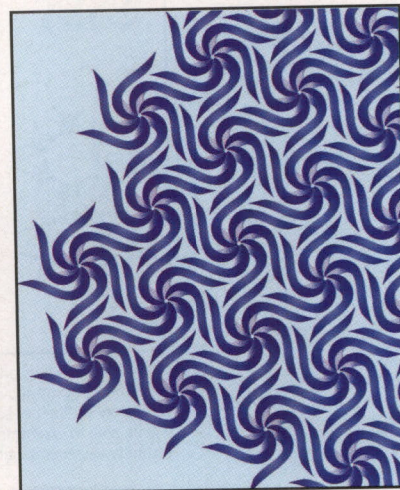
The practical approach continued...



7 To increase the feeling of depth, we've removed the strokes and added a radial gradient to the inside shape while the outside is filled with a linear gradient with richer colours.



8 As the basic tile was created using a 2x2 setting we can increase the tile ratio through the SymmetryWorks palette to suit our purposes, confident in the knowledge that the repeat pattern will be perfectly smooth.



9 In just a few quick steps we've created a complex tile sequence that would test the patience of even the best designers using *Illustrator's* standard tools. **ca-s**

SymmetryWorks [full version]

Now you've tried our tutorial using the SymmetryWorks demo, here's what the full version can do...

Artlandia SymmetryWorks is an Adobe *Illustrator* plug-in that enables you to easily create and interactively edit symmetrical patterns and designs. At your command, the plug-in replicates the selected part of your artwork and automatically applies all the necessary rotations, reflections, and other transformations to create a pattern of the chosen symmetry type. Then you can edit the pattern interactively. As soon as you modify a selected element, the plug-in immediately updates the entire pattern to echo your change.

Making a pattern

If you know basic Adobe *Illustrator* techniques, you will find working with SymmetryWorks very easy.

- Start by creating one or more *Illustrator* path objects, for example, with the Pencil or Pen tool. Then choose Object>SymmetryWorks>Make.
- The plug-in automatically duplicates selected elements and applies the necessary transformations to make a pattern.

Adding to a pattern

Adding elements to a SymmetryWorks pattern is very much like adding elements to a masked *Illustrator* artwork: you simply move a new element to the desired location, cut it, and use the Edit>Paste Inside commands to paste the element inside the pattern.

The SymmetryWorks plug-in is available for both Mac OS and Windows.

To order SymmetryWorks at **\$124** for the *download* version and **\$50** for the student copies

visit

[w] <http://www.artlandia.com/>



Win [Illustrator and Streamline]

Enter and you could win a first prize of *Illustrator 10* plus *Streamline 4.0* courtesy of... 



e've teamed up with Adobe to offer you the chance to win a first prize of *Illustrator 10* plus *Streamline 4.0* and four runners-up prizes of *Illustrator 10*. All you have to do to enter is answer our question.

About Illustrator 10

Illustrator 10 gives you the ability to balance image quality and file sizes and provides Web-savvy tools to help you minimise file size without sacrificing the quality of your artwork.

Unlike their raster-based counterparts, the vector elements you create within *Illustrator 10* remain completely editable.

The Symbols tool enables you to manage repeating graphics efficiently, create a symbol and then use as many instances of it as you need.

File size stays small because the symbol is defined only once, and the instances reference the symbol. In addition, the instances update automatically when you edit the symbol.

About Streamline 4.0

Streamline 4.0 gives you maximum control for converting images to line art. Faster than a tracing hand, Adobe *Streamline 4.0* software instantly converts scanned black-and-white or colour raster images into editable Adobe PostScript line art. Just scan any sketch, and *Streamline* will automatically create a file that you can drag and drop into *Illustrator*.

The question

Which tool in *Illustrator* enables you to manage repeating graphics effectively?

To enter

The easiest way to enter is via our Website at [\[w\] www.computerarts.co.uk/competitions](http://www.computerarts.co.uk/competitions). Enter *Streamline* as the competition name, and fill in the rest of the form. Click Submit Entry. If you don't have Web access, you can send your answer on a postcard,



To find out more about Adobe *Illustrator* and *Streamline* visit [\[w\] www.adobe.com/products](http://www.adobe.com/products).

along with your address and a contact number to: *Streamline Competition, Computer Arts Special*, 30 Monmouth Street, Bath, BA1 2BW.

The rules

The competition closing date is 7 December 2002. Employees of Adobe or Future Publishing, or any of their agents or families, may not enter. Multiple entries will not be accepted. The editor's decision is final. There are no cash alternatives. No correspondence will be entered into. If you are entering by post and do not wish any of the companies involved in this competition to contact you with further offers, indicate this on your entry. We won't pass details on to third parties.

Previous winners

Issue 34 — *Photoshop*: N Kramer from Leeuwarden, Holland, and John Paterson from Dundee.
Issue 35 — *Get Started in Digital Art*: Anthony Martin from Wigtownshire, Ellen Stafford from Bath, Annette Fincher from Texas, USA, John Donnelly of New Jersey, USA, and Ian Yule from Reading. 



Top 3 illustration packages

Which illustration package is best for you? Read our reviews of the three top applications before making your choice...

There are three main illustration packages in the creative industry — Adobe *Illustrator*, Macromedia *FreeHand* and CorelDRAW. The latter, however, has been somewhat relegated to the sidelines in the UK, leaving *Illustrator* and *FreeHand* to battle it out for a place on the designer's desktop. But *DRAW* is fighting back and, as you'll see from the review of version 11 on page 43, it includes a number of interesting new features and proves to be great value for money.

In recent years all three applications have been playing catch-up features-wise. This has been going on mainly with *Illustrator* and *FreeHand* — within six months of a new version of one of these applications coming out, the other will echo or better a feature. *DRAW* usually catches up a couple of releases later.

Illustration packages can be used for very different things.

Illustrator is regarded by many as a professional illustrator's tool, in that it has a wide variety of creative features that enables the artist to recreate sketches in digital form. *FreeHand* is more of a graphic and Web design tool, featuring multi-page functionality and excellent integration with *Flash*. *DRAW*, however, is regarded as excellent value, providing a vector illustration package, a bitmap editor and SWF animation app all in the same box for a shade under £400.

It's entirely down to personal preference which application you choose, but we're here to guide you — breaking down the features of each and giving you an insight into the power of the three top illustration packages. Read on over the next few pages and decide which application best suits your creative and professional needs... ➤

Illustrator 10

A whole host of ingenious and intuitive tools makes *Illustrator 10* a truly remarkable vector drawing application...

Price

£387

Company

Adobe

Telephone

020 8606 4000

Website

www.adobe.co.uk

Illustrator has long been one of the two industry standard illustration packages (the other being Macromedia *FreeHand*) and with every new release it usually throws a plethora of tools into the equation. Version 10 is no exception, and although the package has been available for a while now, many of its features still feel rather revolutionary.

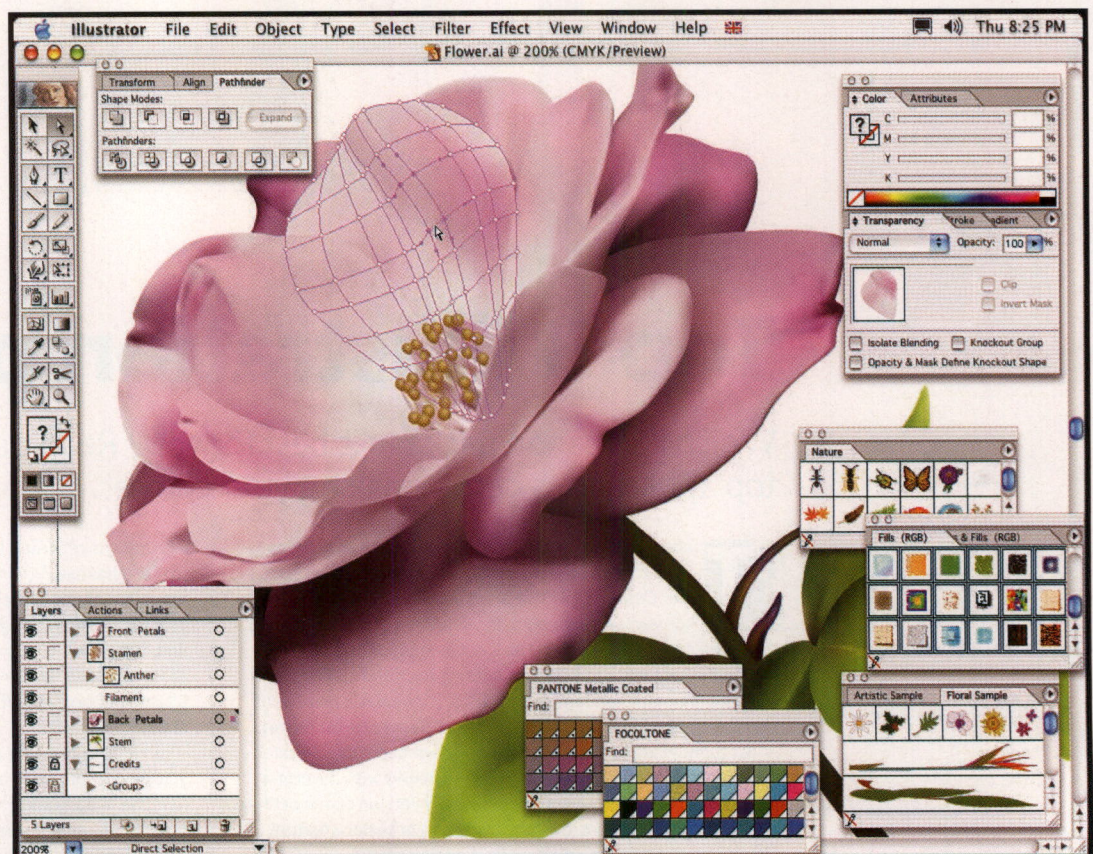
The main addition to version 10 is what Adobe calls the Symbolism tools. Many illustration packages nowadays enable you to save a graphic as a symbol — a reusable element within your document. Adobe's incarnation of this idea pushes the envelope even further. The Symbolism tools on offer enable you to spray symbols onto your page, then scrunch them together,

spread them apart, rotate them, shrink and expand them, colourise them, screen them and even add a style to individual symbols from the Styles palette. All of the tools work as dynamic brushes — you paint the effect onto the symbol. And all have a good amount of options. When you're done, your symbols can be broken apart and unlinked from the original symbol in the Symbols palette and edited as individual objects. These tools are incredibly handy for creating

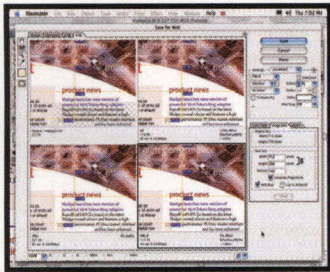
multiple versions of the same graphic, and are extremely easy and, to be honest, fun to use.

The new Envelope distortion tools are also quite excellent, enabling you to set a pre-set envelope to a graphic, and edit the graphic using a mesh. Alternatively, you can use a custom shape as an envelope. The new Liquify tools are similar, in the fact that you can now interactively warp, twirl, pucker, bloat or add various edge effects to your objects. These, like the Symbolism

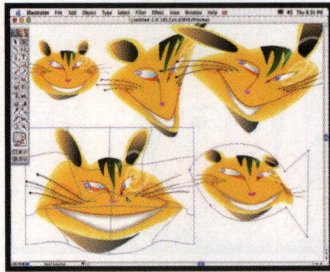
"The Symbolism tools are extremely easy and, to be honest, fun to use"



Illustrator 10's creative tools are second to none. Add some great workflow features and a top-quality PostScript preview and you have an awesome app.



A similar Save for Web tool to *Photoshop* along with the ability to slice up graphics on a per-object basis are present in *Illustrator*.



New Live Distortion and Enveloping tools make transforming objects in *Illustrator* a matter of dragging a bounding box.

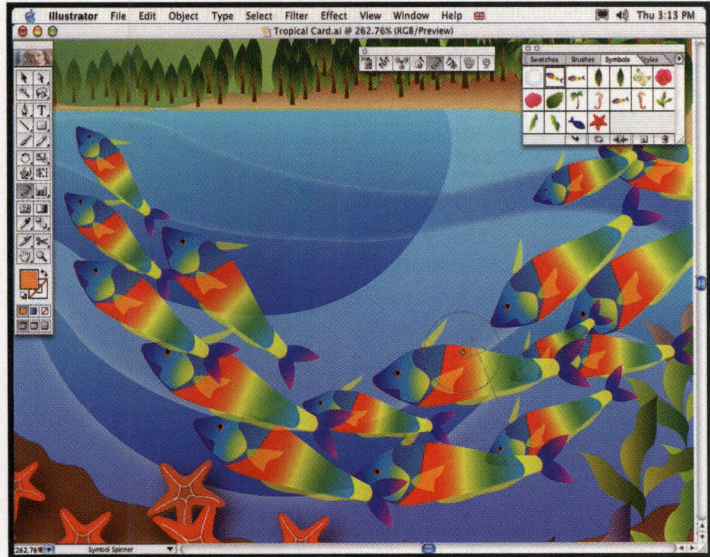
tools, are brush-based and incredibly easy to use. New drawing tools including Line and Arc tools are here. And the Pathfinder, used for creating compound shapes, has been improved — combined objects are now 'live', meaning you can edit original elements without redrawing them. An ingenious Magic Wand tool enables you to select a range of objects with similar attributes, based on stroke weight and so on. You can even save and recall selections just like in *Photoshop*.

The last of the creative tools to be included is the Flare tool. Seems strange, we know, but it's actually quite useful. This tool supposedly enables you to create vector-based lens flares — ideal for adding highlights to vector shapes, making for more realistic imagery. Results are not exactly photo-realistic, but interesting enough. A great thing is that because the flares are vector-based, they can be

animated in *After Effects* or *LiveMotion*.

Data-driven graphics are new to *Illustrator*. The premise is simple: design a template and specify variables to place and replace graphics from ODBC-compliant databases. Enhanced scripting support is also present.

Illustrator Web functionality has been ramped up with V10, and the application now features an enhanced Save for Web dialog, along with object-based slicing. The latter enables you to slice your image up according to vector objects on your page — very nifty. Of course you can still slice images manually. These slices can be individually tweaked to make sure you have the right compression amount for each part of your image — again, a great idea. Support for CSS layers, enhanced SWF support and better SVG tools (along with the Symbolism tools mentioned earlier) make for a very Web-orientated release.



The Symbolism tools in *Illustrator* are the best incarnation of this technology we've seen. Not only can you scatter instances on a page, you can interactively adjust transparency and even add styles.

The only thing really wrong with *Illustrator* is its lack of ability to create multi-page documents. There's no real excuse for this, as virtually every vector app has this feature. However, you can get third party plug-ins that simulate multiple pages by the clever use of layers.

Other than a minor grumble, *Illustrator* is a top-notch application; and with vector transparency, excellent drawing tools, reliable PostScript output and more, it's ideal for the professional illustrator.

FreeHand 10

Is *FreeHand* setting new standards or playing catch-up with its rival illustration package? As it happens, it's doing a bit of both...

Price
£328
Company
Macromedia
Telephone
01344 458 600
Website
www.macromedia.co.uk

The other industry standard vector application, *FreeHand*, has been battling with *Illustrator* for the crown of top illustration package. However, the two applications remain pretty much on a par, although Adobe's Symbolism tools probably give *Illustrator* the edge. *FreeHand* 10 is no slouch though, and contains many, many tools for the professional illustrator and graphic designer to get their teeth into.

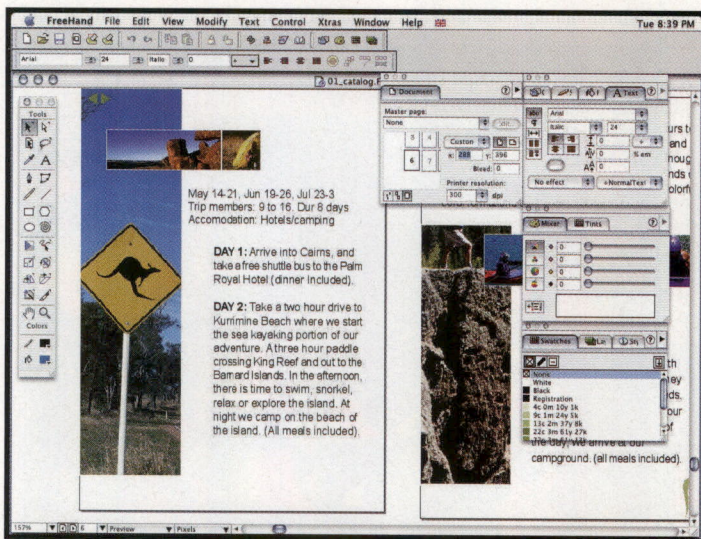
The main difference between *FreeHand* 10 and previous releases of the app is the interface. Macromedia

had, at the time, brought the look of the application into line with *Flash*, *Fireworks* and *Dreamweaver*. However, when the MX line was released, *FreeHand* was not updated. Still, the interface is user-friendly and extremely clean.

FreeHand is slowly becoming more of an aid to *Flash* than a professional illustration tool, and version 10 sports a

whole host of Web-orientated features. The most prominent of these is possibly the Flash Navigation Panel. This enables you to create a basic, Flash-based Website entirely in *FreeHand*. Simply assign links or Flash actions to graphics on your page. It's a nifty way of previewing how your site will work, but the pros will probably stick to the intricacies of *Flash* itself. >

"Version 10 sports a whole host of Web-orientated features"



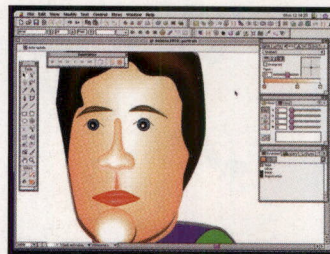
FreeHand 10 enables you to create up to 32,000 master pages – turning it into a fully-fledged DTP application as well as an excellent illustration solution.

The Symbol Library in *FreeHand* has always been one of the application's strong points, and the Library in version 10 holds a few excellent features. You can, for instance, now edit symbols in the *Flash*-esque Symbol Edit window – simply double-click a symbol in the library. You can update instances by simply hitting the auto update button in the Library palette. The Library is saved with the document and symbols remain in use, even if the document is exported as an EPS and then reopened in *FreeHand*.

In terms of print-orientated features, *FreeHand* sports the usual Bézier and shapes toolset, along with the ability to

create and manage up to 32,000 master pages in a single document. We can't imagine you ever needing 32,000 master pages in a document, and we suspect that if you had this many masters, you'd need a whole load of RAM. Anyhow, master pages work exactly like in *XPress* – enabling you to specify certain page furniture and the like for reproduction on each, or every other page. It works... what more can we say? Oh, there is one thing. You can import master pages into the symbol library, giving you the ability to use them like any other symbol.

Illustrator has always excelled in its natural-media-esque tools. In a bid to



The Contour Gradient feature of *FreeHand* makes it possible to add gradients that follow the contours of your objects.

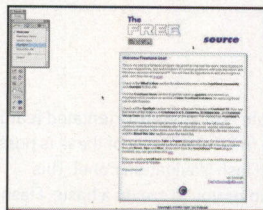
catch up, *FreeHand 10* has Spray and Brush strokes. After creating a symbol it can be transformed into a brush and applied to any path. The brushes can take the form of paint, where your symbol is stretched and distorted along a path, or spray, in which *FreeHand* scatters instances of your symbol along a path. Both methods are intuitive.

Then there are Contour Gradients. In an attempt to catch up with *Illustrator*'s excellent Gradient Mesh tool, Macromedia has added this feature to *FreeHand*. The feature is pretty easy to grasp: the fill follows the contours of the outlining path. This feature doesn't offer the same artistic control as *Illustrator*'s Gradient Mesh tool, but nevertheless, some interesting effects are possible.

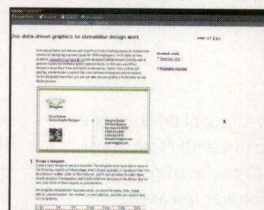
FreeHand is a very attractive package, but we feel it will appeal more to the graphic designer than the illustrator – those who will benefit from such features as multiple page documents and master pages. And as a complement to *Flash*, it's ideal.

Taking illustration further

Five online resources to help you improve your vector illustration skills...



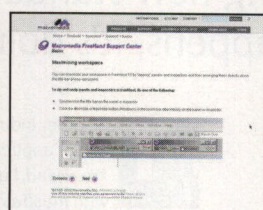
<http://www.freehandsource.com/>
An intelligent *FreeHand*-based interface holds the key to tons of tips, downloads and free tutorials. One of the best *FreeHand* resources on the Web.



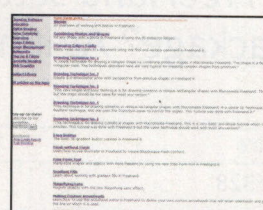
<http://studio.adobe.com/expertcenter/illustrator/main.html>
Adobe's own *Illustrator* Expert Centre is bursting with excellent tips and tutorials. Everything from colour management to brushes is explored and all of the tutorials can be printed for use at a later date.



<http://www.designer.com>
Corel's Designer.com has just had an extensive redesign and now looks the part as well as supplying an extensive amount of *CorelDRAW* tutorials and other goodies. If you're a *DRAW* fan, you can't miss this.



<http://www.macromedia.com/software/freehand/resources/tutorials/>
The equivalent to Adobe's Expert Centre, Macromedia's *FreeHand* site offers a wide range of tutorials covering everything from master pages to symbols.



<http://graphicssoft.about.com/cs/freehandtutorials>
Links to handy *FreeHand* tutorials at About.com's excellent graphics software resource. Learn everything from the basics of Bézier drawing to creating Flash animations without ever venturing into Flash itself.

CorelDRAW 11

Under-rated and under-used, *CorelDRAW* is a proficient illustration application that offers great value for money...

Price

£399

Company

Corel

Telephone

0800 581 028

Website

www.corel.co.uk

Being the most recently released of the three illustration packages here, you'd kind of expect *CorelDRAW* to include some revolutionary new features that set it apart from *Illustrator* and *FreeHand*. Unfortunately, this is not the case. Don't get us wrong — the new tools in *DRAW* are great, but Corel is simply playing catch-up with the big two.

DRAW is not exactly the most popular of tools among professional designers in the UK. This is not because *DRAW* is a bad product — in fact it's pretty good — it's just the fact that Adobe and Macromedia have

completely cornered the market with two outstanding tools. Corel never really stood a chance.

Anyway, onto *DRAW 11*. If you didn't know, when you buy *DRAW* you get a whole load of applications. As well as the vector tool (*DRAW*) you get, among other things, *PHOTO-PAINT 11* (image editor), *TRACE* (bitmap-to-vector tracing like Adobe *Streamline*), *RAVE 2.0* (Flash animation), *Bitstream Font Navigator* (PC only) and Corel's *Duplexing Wizard* for printing on both sides of paper. There are also thousands of fonts, clip art and stock photos in the box. In short, *CorelDRAW* is fantastic value.

New features of *DRAW* include symbols. Yes, we know this is no surprise, but surely Corel has done something different with its incarnation, right? Wrong. Corel's implementation of symbols is bog-standard in that you have a library and you can save and reuse instances. However, it was much needed (but it's not a patch on Adobe's Symbolism tools).

Other new additions to *DRAW* include Smudge and Roughen brushes. These enable you to interactively warp vector objects. These are again nothing new in the world of vector illustration, but a welcome addition to *DRAW*. Along with these is a new Pen tool and some new three-point drawing tools (Ellipse, Curve and Rectangle). Add a standard Bézier tool and we think you'll agree that drawing in this app is pretty much sewn up.

Other new additions include enhanced snapping, better align and distribution options and support for Adobe's SVG format.

We haven't yet mentioned *PHOTO-PAINT*. This is an incredibly proficient image-editing application — almost on a par with *Photoshop* itself, and to think you get it bundled with *DRAW* is incredible. New features added to *P-P* include a nifty KnockOut-esque extract dialog for cutting out complex objects, image slicing, and stitching tools for creating QT panoramas. New filters include a Spot filter for recreating Depth Of Field and improved Lens Flare and Lighting Effects dialogs.

The last of the main applications is *Corel RAVE*. Standing for (we know, it's rather cheesy) Real Animated Vector Effects, *RAVE* is an SWF animation app. *Flash* this is not, so don't go getting excited. However, if you have the need for animating simple objects along a path and creating text effects, it's not bad for nothing. *RAVE* sports symbol functionality — so you can create your graphics in *DRAW* and easily translate them into animations.

There's no doubt that *DRAW* is good value for money. If you want a complete set of graphics tools in one box and don't need the creative tools of *Illustrator* or the precise layout features of *FreeHand*, it may be worth a shot. **CBS**

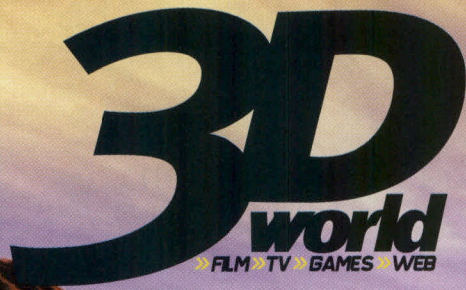
"When you buy DRAW you get a whole load of applications"



CorelDRAW 11 sports some interesting new tools such as Symbols — enabling you to save and re-use graphic elements on a page.

THE INTERNATIONAL MAGAZINE FOR 3D ARTISTS

ISSUE 31 NOW ON SALE: PRICE £6.00



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9 PAGES OF INSIGHT FROM THE PEOPLE WHO HIRE

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PLAYING GOD: HOW TO CREATE
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3D ENVIRONMENTS

CREATING A KILLER SHOWREEL

SIMPLE RULES THAT ENSURE YOUR
TALENT DOESN'T GO UNNOTICED

CINEMA 4D R8

FIRST LOOK AT MAXON'S NEXT-GEN APP

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>> POSER 5 >> BRAZIL 1.0

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WORLD EXCLUSIVE! 3DS MAX 5 YOUR FIRST CHANCE TO TRY DISCREET'S UNBEATABLE NEW
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THIS ISSUE:

COMMUNITY SERVICE



THE BIG ISSUE: COMMUNITY SERVICE

Experts discuss how community elements can be used to benefit clients' sites, PLUS: *Cre@teOnline* delivers a list of key ingredients for effective online communities



DESIGNERS VERSUS HACKERS

We interview Stuart McClure, author and Web security expert. Find out the techniques hackers are using and what the main weaknesses of today's websites are



MISSILE ON TARGET

Find out how Rockstar won the pitch to do The Prodigy's latest website by building a 7-foot fake missile (and, of course, how they designed the site...)



MASTERCLASS SECTION **NEW!**

Cutting edge creative and technical skills in our new Masterclass section. This issue we look at advanced HTML and building multi-user servers

PLUS: The Men in Black II mobile campaign, UK newspaper sites in our usability test, Deep Purple's latest DVD, great new sites and more...



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Enter our competition and you could win one of three copies of *CorelDRAW 11*...



e've teamed up with Corel to offer three lucky readers the chance to win *CorelDRAW Graphics Suite 11*, worth £444.99 (SRP including VAT).

CorelDRAW Graphics Suite 11 represents the company's flagship suite of graphics programs, comprising *CorelDRAW 11*, *Corel PHOTO-PAINT 11* and *Corel R.A.V.E. 2*.

The suite is a collection of professional graphics tools designed to make graphic work more creative, enjoyable and fun. The package includes a wide array of new features and enhancements that are designed to increase ease of use while also delivering the power to create professional designs.

New features in CorelDRAW 11

- *CorelDRAW 11*: includes a variety of tools to assist in basic drawing.
- *Corel PHOTO-PAINT 11*: new tools for creating Web elements and editing photos and images are

introduced in this latest version of *PHOTO-PAINT*.

- *Corel R.A.V.E. 2*: the second version of Corel's vector animation tool focuses on lowering file size and extending functionality.

Question

Which three programs make up *CorelDRAW Graphics Suite 11*?

To enter

The easiest way to register your entry is via our Website at [w] www.computerarts.co.uk/competitions. Or you can click the Competition tag on the Contents screen of our cover CD, then enter *CorelDRAW* as the competition name, and fill in the rest of the form. Click Submit Entry. If you don't have Web access, you can send your answer on a postcard, along with your address and a contact number to: *CorelDRAW Graphics Suite 11 Competition, Computer Arts Special*, 30 Monmouth Street, Bath, BA1 2BW.

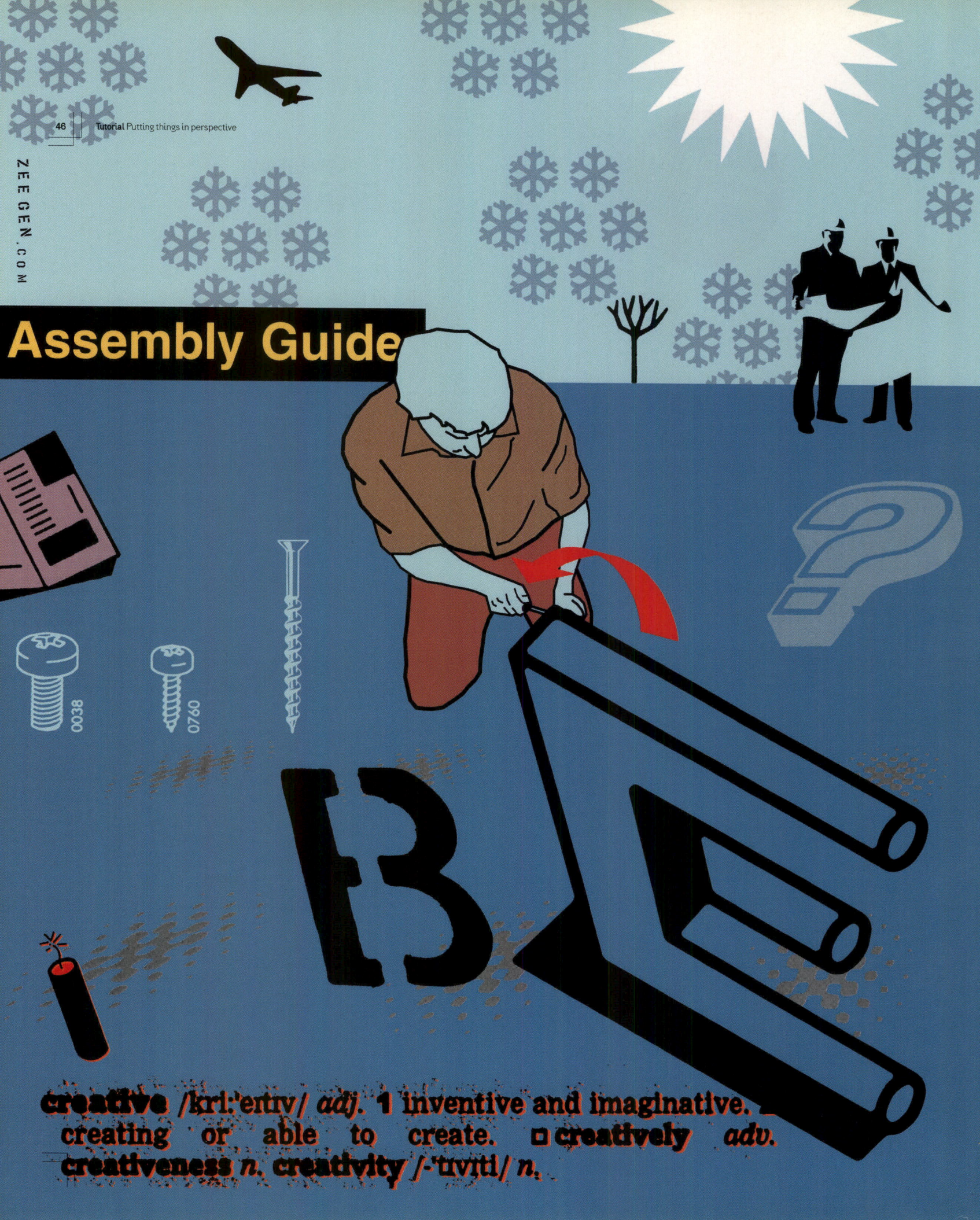
The rules

The competition closing date is 5 December 2002. Employees of Corel or Future Publishing, or any of their agents or families, may not enter. Multiple entries will not be accepted. The editor's decision is final. There are no cash alternatives. No other correspondence will be entered into. If you are entering by post and do not wish any of the companies involved in this competition to contact you with further offers, indicate this on your entry. We won't pass details on to third parties. **ca-s**



For further information on *CorelDRAW Graphics Suite 11* you can telephone [t] 0800 581 028 or visit Corel's Website at [w] www.corel.com/graphicsuite11. Details on all other Corel products can be found at [w] www.corel.com.

Assembly Guide



creative /kri:'eɪtɪv/ *adj.* 1 inventive and imaginative. 2 creating or able to create. ☐ **creatively** *adv.*
creativity /-tɪvɪti/ *n.*



Putting things in perspective

FreeHand 10 has some powerful tools that can help create the illusion of perspective. Using a combination of visual tricks, optical illusions and sleight of hand, we show you how to get creative with the application's features...

FreeHand 10 offers a veritable box of visual tricks. To create perspective in your illustrations, both convincing and imaginary, requires the use of some simple, yet effective, wizardry. Throughout the tutorial you'll jump from the basic set-up of your artwork to creating some convincing vector drawings and then learn how to 'roughen them up a bit'. You'll move on to get your head around the principles of auto-tracing, skewing, and 3D rotation as well as revisiting basics such as the colour fill of objects. Learn how to effectively mirror auto-traced imported images, use the Envelope tool and then take on the beasts that are the Perspective Grid and Perspective tool.

With a nod in the direction of a surreal landscape and with hints of the impossibility of building flat-pack furniture thrown into the mixing pot with some 3D optical illusions, we show you how to bravely take on the creation of this strange New World. ➤



Expertise and artwork by Lawrence Zeegen, freelance illustrator and Academic Programme Leader for Communication and Media Arts, at The University of Brighton. You can view his work at [w] www.zeegen.com.



Files on disc

The files needed to complete this tutorial are on your cover CD in the Tutorial/Depth folder. These files are for non-commercial, personal training purposes only. They should not be reproduced elsewhere.

Part 1: The base layers

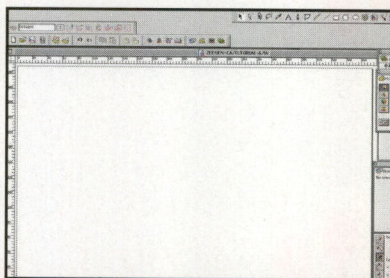
Create base shapes for your illustration using the Rectangle, Line and Polygon tools as well as guides and custom fills...

Inspiration

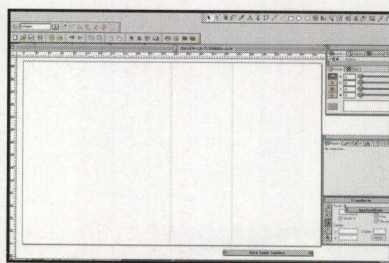
Asked to create a tutorial that used the Perspective tool, Lawrence Zeegen looked for inspiration in visual puns, optical illusions, surrealist art, the construction world and instructions for flat-pack furniture. A broad starting point that led to a final image that looks almost visually possible!

Work smart

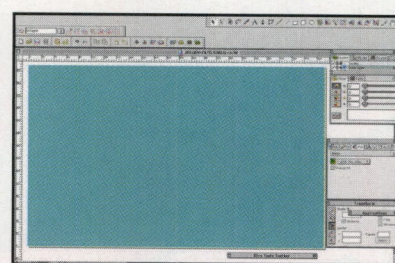
It really is crucial to prepare your document before starting the creation of your illustration. Create a new folder so as to keep all components of the illustration in the same place: good practice that makes sense. Mark the gutter, bleed and other important areas within the page to ensure that you take them into consideration before it's too late.



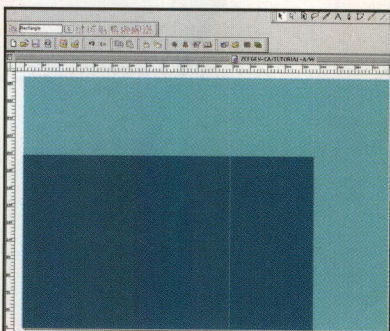
1 Launch *FreeHand 10* and create a new file. Go to Page Inspector>Inspector Panel>Custom and set the page size to X: 474mm and Y: 290mm. Click on the Landscape shape within the Inspector Panel to ensure the correct page view. This is now the exact size of the double-page spread in *Computer Arts Special* plus a 5mm bleed on all four sides.



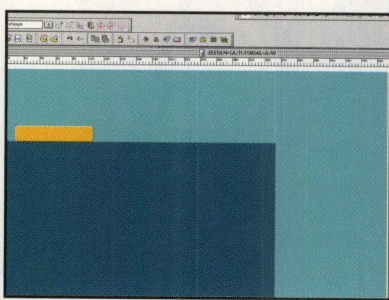
2 Unlock the Guide layer and, dragging the guide from left to right at 237mm, mark the centre of the spread, known as the gutter. Next, mark 5mm in from each of the four sides. This 5mm is known as bleed, and is there to allow for correct trimming after print. Finally, mark a line at 334mm to show the approximate position of the start of the two columns of copy/text that introduces this feature.



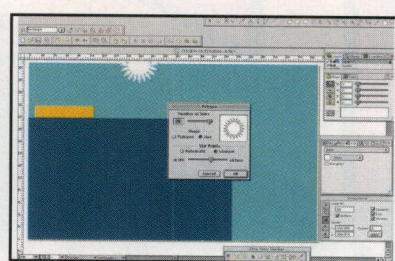
3 To create the very lowest base layer of the illustration use the Rectangle tool to draw a large box to cover the entire page. Create a new colour in the Colour Mixer/Colour Panel by mixing 35C, 0M, 12Y and 0K and go to Fill>Inspector Panel to fill your new rectangle with your desired colour. Next go to Line Tool>Tools to remove the line/stroke.



4 Next create another background layer with the Rectangle tool using a new colour mixed from 80C, 28M, 25Y and 0K. Fit this new shape up to the second guide and at about 200mm high from the baseline of the illustration.



5 Do the same once more, creating a much smaller rectangle on a layer that sits on top of the previous two. Go to Line Tool>Tools to remove the line/stroke. Create a new colour mixed from 0C, 78M, 100Y and 0K. This shape should be positioned on the 'horizon'. Ensure the shape is about 20mm high by 100mm across.



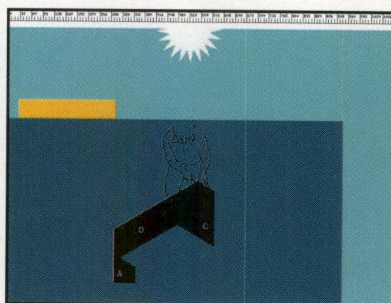
6 Open a new layer; double-click the Polygon tool from the menu bar to open the Polygon dialog window. Move the Number of Sides slider to give 20 sides, check the Star option and Manual on the Star Points. Set the Slider towards the Obtuse range, creating a circular 'flash' shape. Draw into your new layer ensuring the stroke and fill are both white. Position as in the illustration, cropping out of the top.

Part 2: Creating vector drawings

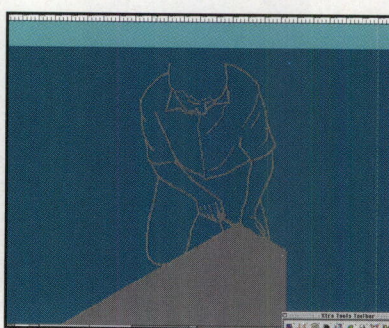
Use the Pen tool to create your vector drawings...

Colour checks

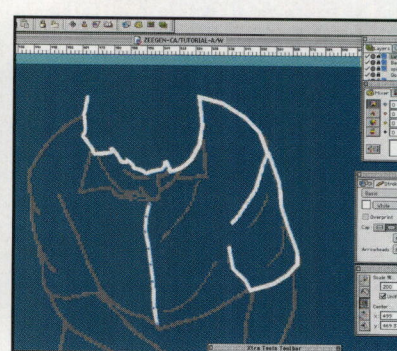
Checking colours before you go to print is a vital aspect of the job. This tutorial works from the four colour-set — C (Cyan), M (Magenta), Y (Yellow) and K (Black) — as it is designed to be printed through the off-set lithographic process. If you are designing for screen then work in R (Red), G (Green) and B (Blue) as this is the format that your monitor uses to display colours. Check CMYK colours using a Pantone print chart to ensure you are getting the exact colour you want rather than a 'screen version'.



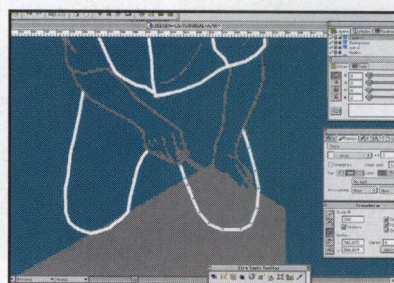
1 From the folder Tutorial\Depth on the cover CD, locate the file named fix-it-man.tif. Into the Background layer, which you must move to the top of the layers box, choose File>Import, highlight the file and click Open. The image will now import into your document. Place to the left-hand side of the gutter and then in the Transform Panel locate the Scale tool and set to 20 per cent.



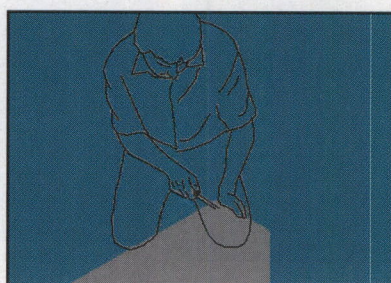
2 Create a new colour made from 0C, 0M, 0Y and 40K and change the fill of your imported.tif to this as you will use the images as a guide to draw your own version. The image is not all needed; you can ignore the detail around the figure. Using the magnifier increase the viewing size, and don't worry that the figure appears digitised.



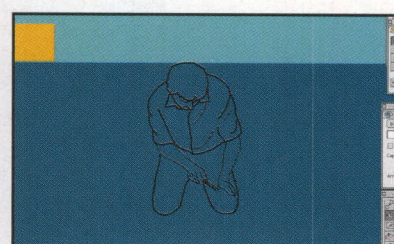
3 On a new layer and with the Pen tool set to white (for ease of viewing) and 1.5 point (you may need to adjust your measurement view at the bottom of the screen from millimetres to points), start to trace/draw the figure carefully. Start with the main outline of the figure.



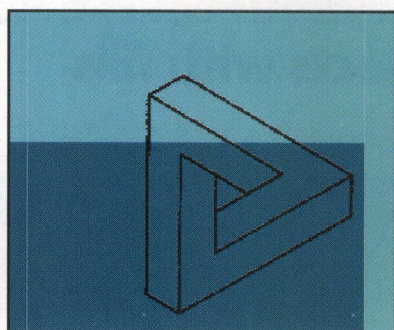
4 When it comes to tracing/drawing the figure's right knee (as he faces you) you'll have to imagine where it would fall beneath the black unneeded area. This is pretty straightforward, just use the other knee as a guide! Do the same with the top of the head too as this is missing from the original scanned drawing.



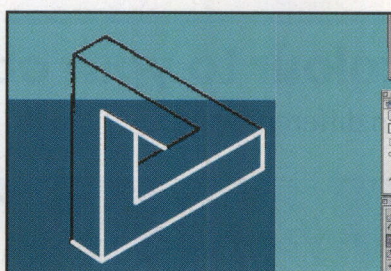
5 Once the figure is completely drawn, it is time to change the colour of the stroke to a mix of 60C, 40M, 40Y and 100K. This may look like a straight black but is in fact the strongest combination of CMYK. Obviously if you are creating an illustration in just black line to print one-colour black, this mix would not be appropriate.



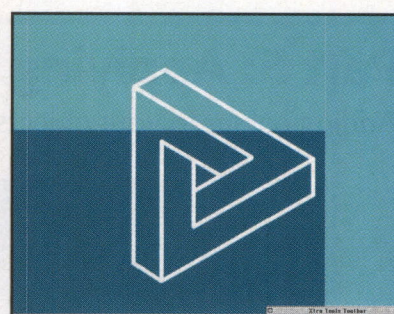
6 Be sure when you check the stroke that the middle option of the Cap setting is set. This gives a more rounded look to the line. Next, click on some of the lines and alter their weight; it makes sense to make the detail lines slightly thinner. Remove the Background layer. Preview the image in Flash Anti-alias from the preview option at the bottom of the screen to view how your final version will look.



7 Next, import object.tif from the cover CD. Place it onto Background layer and Transform/Scale by 200% and then use the magnifier to increase the size visible on screen. Place to the right-hand side of the gutter as in the main illustration.



8 Trace/draw the object using the Line tool, rather than the Pen tool to create a perfectly drawn copy of the low-res scan into a new layer placed over the original. Translating these images to vector at this stage will give you greater flexibility later in the making of the illustration. Use the Line tool set to white, for viewing ease (once again) and at 4pt with the Cap set to the rounded setting.



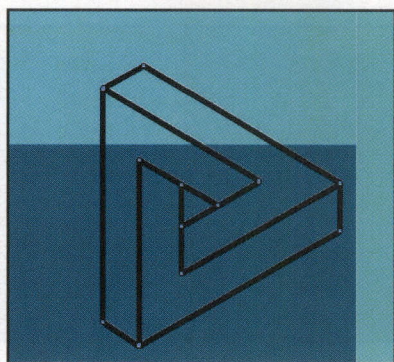
9 Carefully, using the magnifier, check the points where the lines meet to ensure that no ugly overlapping is taking place. Remove the Background layer, highlight all of your line work and convert to the black, mixed earlier. You can move the 'impossible object' into the correct position later.

Part 3: Making vector drawn objects look 'real'

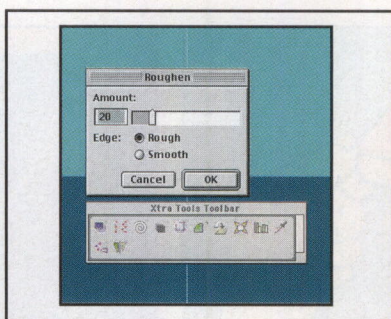
Roughen up your vectors a bit...

Roughen it up

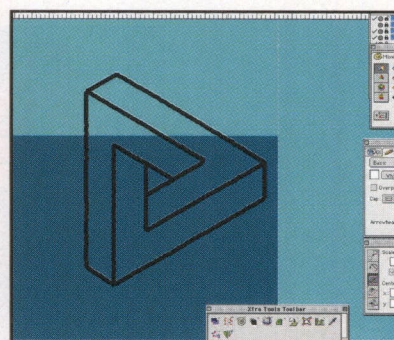
A clever little trick is to use the Roughen tool to create a more hand-created vector so that they fit visually with the imported pre-scanned drawings and images. Practise with this tool to get the effect you want, but it is worth remembering that it is best used in moderation. Don't get too heavy handed!



1 Your 'impossible object' needs to look similar to other scanned tifs that will later appear in the illustration. *FreeHand* allows you to roughen your vectors a bit. First, though, change the stroke colour to your special black once again.



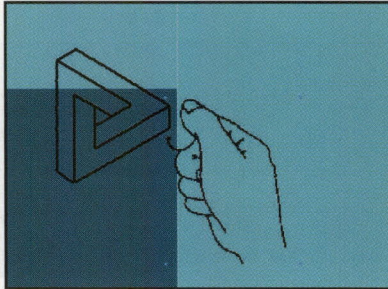
2 Display the Xtras toolbox, from the drop-down Window/ToolBars/Xtra Tools and double-click on the right icon. Set the dialog box settings to Amount: 20 and Edge: Rough and click OK. The Rough option adds corner points to the paths to create the rough edge whereas the Smooth option adds curved points creating a less harsh edge.



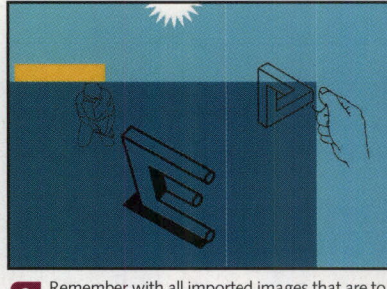
3 With the entire object highlighted drag the Roughen tool across the image very slightly. The more that you drag, the greater the distortion that will appear. This may take a few attempts to create the right look. Remember to view at 100% before making your final decision. ➤

Part 4: Importing images and flipping one over

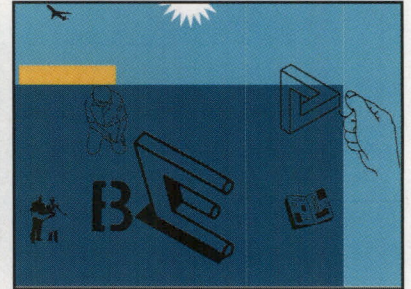
Bringing in some existing images and merging with vectors...



1 From the folder Tutorial\Depth on the cover CD, locate the file named hand.tif. Into a new layer choose File>Import, highlight the file and click Open. The image will now import into your document. Place to the right of the 'impossible object' and then in the Transform panel locate the Scale tool and set to 350%. Press Apply and move to approximate position.



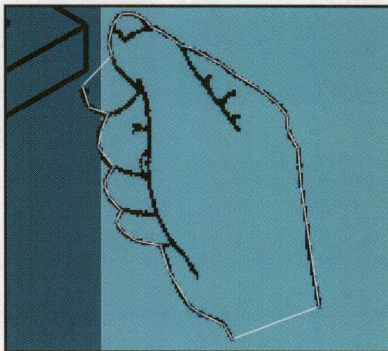
2 Remember with all imported images that are to print in black it is important to change the Fill colour to the CMYK black that you mixed at the start. They will not look any different at this stage but will when the illustration prints. Bring in from the CD the file named E.tif and make transparent by going to Inspector Panel>Object and checking the Transparent box with the image still active. This should be done for all images that you'll be importing.



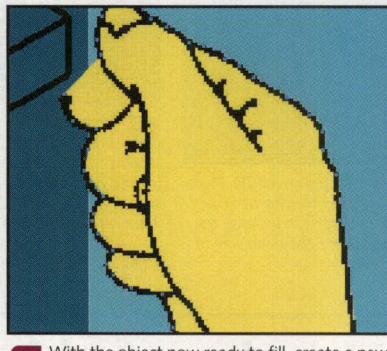
3 Bring in the following files from the cover CD: builders.tif, B.tif, mag.tif and plane3.tif. Place in approximate positions and at sizes as shown. Make CMYK black and transparent and then you should be ready to start applying colour as the illustration starts to take shape. The plane3.tif image will also need to be flipped so make the image live and go to Panel>Transform>Reflect, key in 90% and apply.

Part 5: Applying colour to your objects with fills

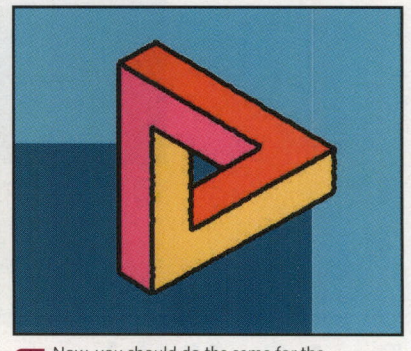
Adding colour to your objects in different ways...



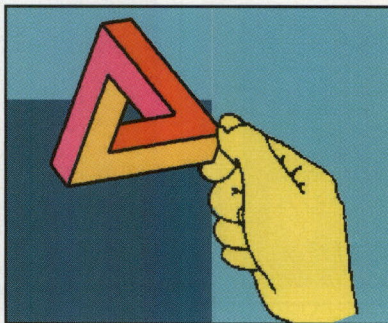
1 Add colour to the hand first by creating a new layer and setting the Line tool to 1pt and the colour to white. Trace/follow the lines of the face and then go to Modify>Join to join up the newly drawn lines so that the object can be filled with colour.



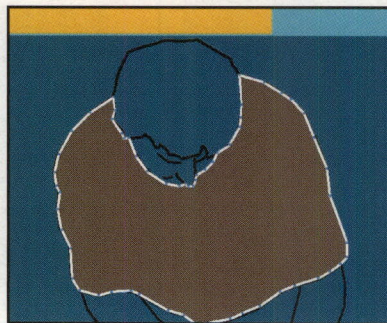
2 With the object now ready to fill, create a new colour – 0C, 57M, 0Y and 0K – and fill the shape. It is good practice to remove the line/stroke at this stage too or change to the same colour as the fill. Place this new layer under the layer with the imported hand on it and the hand is now in colour.



3 Now, you should do the same for the 'impossible object' but in three separate layers all placed beneath the Object layer. Mix the following colours and apply as in the illustration: C0, M15, Y85 and 0K and then 0C 70M, 5Y and 0K and then finally 0C, 78M, 100Y and 0K.



4 Using the Rotation tool in the Transform panel with the amount set to 340 and 'impossible object' and the three colour layers highlighted, click Apply. Move the hand and hand colour layer above these object layers and then navigate the object into position as shown.



5 Using the magnifier enlarge the fix-it-man and onto a new layer above trace/draw the shirt; and in the same way as the hand and object, join the paths and fill with a new colour mixed from 30C, 40M, 60Y and 15K. Place the layer under the original and remove the stroke.



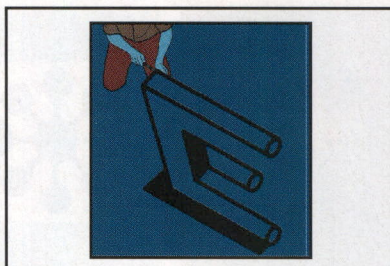
6 Continue in the same way for the other elements of the fix-it-man creating the brown of his trousers from 40C, 70M, 80Y and 0K and the blue from the original base colour of 35C, 0M, 12Y and 0K. Organise the layers in the correct order and your man is nearly ready!

Part 6: Skewing and 3D Rotation

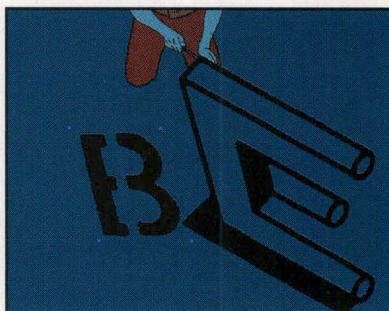
Skewing images to create new angles and rotating elements through three dimensions...

To auto-trace or not to auto-trace

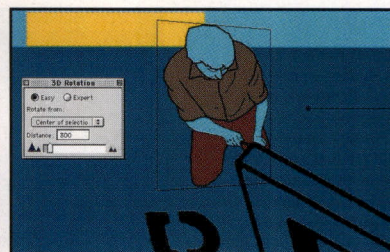
Turning imported elements into auto-traced vectors gives you greater flexibility but, sometimes, at the expense of detail in the final execution. Only trial and error with this tool will give you the best results. Often the desire/need to have complete *FreeHand* freedom with an image forces one's hands.



1 Rotate the E until it's in the desired position and then scale both the man and E by 120 and move into final position. Create a colour fill for the top edge of the E so that the illusion of being transparent is stronger for the man's leg not being visible through the shape.



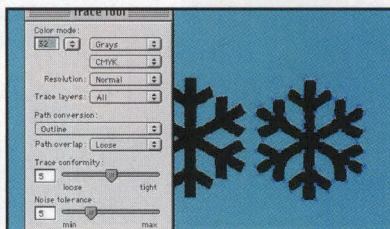
2 Highlight the B and bring into position next to the E and then go to Skew/Transform and key in -15 in the H dialog box, click Apply and the B will slightly skew to the left as in the final illustration.



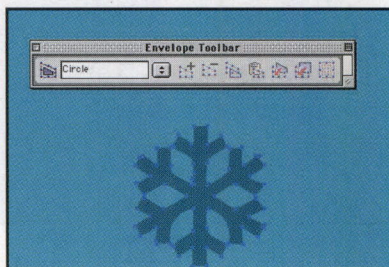
3 Go back to your man and, with all the relevant layers open, highlight the entire batch. Go to the Xtras Toolbox and double-click on the 3D Rotation tool to bring up the dialog box. Click Easy and select Centre of selection and key in 300 in the Distance box. As you drag the mouse a highlight box appears to show how much 3D rotation is occurring.

Part 7: Auto-trace and into an envelope

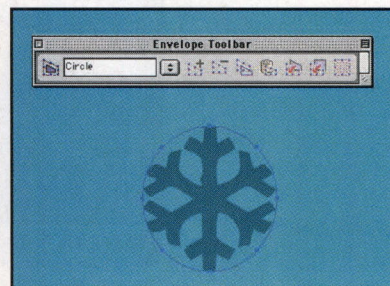
To use the Envelope tool, first auto-trace pre-scanned imports...



1 Into a new layer import the snowflake.tif and scale by 150 and make transparent. Double-click on the Auto-trace tool to open the dialog box and set Colour mode to 32 and CMYK and Normal Resolution and click OK. Click on the Snowflake to create the auto-traced version. Delete the original snowflake.tif as you now have a vector version that can be edited far more easily.



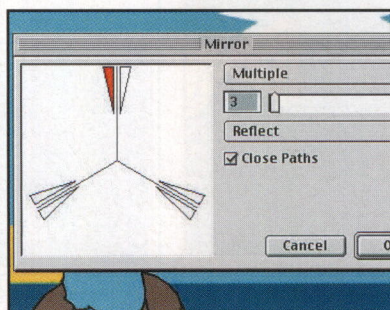
2 With your new version of the snowflake highlighted, change the colour to a mix of 50C, 15M, 20Y and 5K. Next go to Envelope/Tool Bars/Window from the drop-down menu. From the pull-down menu in the dialog window; click on the 'circle' pre-set shape.



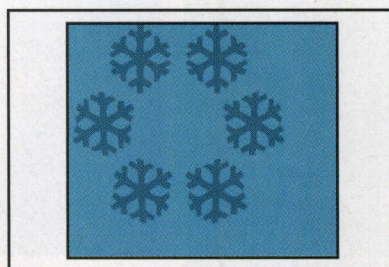
3 Next click on the Envelope tool icon in the top left of the box and your snowflake is constrained in the circular shape. In these few steps you have transformed an imported tif file into a brand new vector and modified its shape.

Part 8: Mirroring made easy

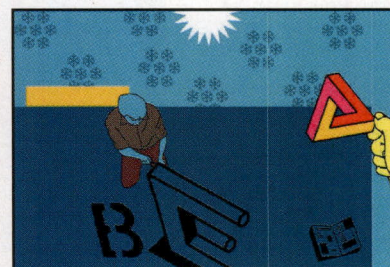
Create duplicate copies of objects mirrored in amazing ways...



1 Highlight your snowflake and double-click on the Mirror tool in the Xtras Toolbox to open the dialog box. Choose Multiple and Reflect with 3 from the slider bar. Click OK.



2 With your cursor drag in the right direction to create a number of snowflakes in a circular formation that are equal distance from each other. This may take a little practice so don't forget that Control/Z takes you back a move if you need to retrace your steps.



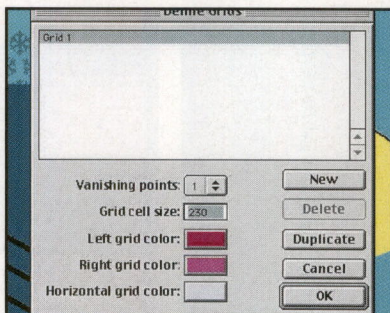
3 As you release the mouse, the snowflakes appear in a perfect circular shape. Select just one snowflake and duplicate the image. Place in the centre of the circular shape and then duplicate the entire set. Now keep duplicating across the skyline of your illustration. >

Part 9: Putting it in perspective

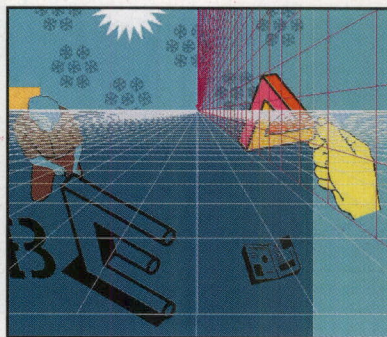
The Perspective tool puts it in the 'right' place...

Perspective

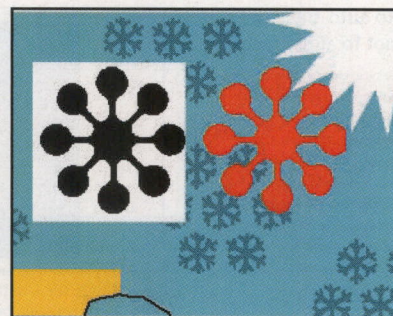
Allowing the computer to take control of the perspective in an illustration is a very tempting proposition, but resist the temptation to hand all the work over. There are many occasions when a strong creative eye spots ways of drawing that the application's mathematical approach just won't allow. Take it easy out there!



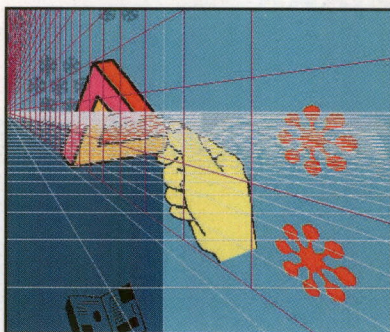
1 To start using the Perspective tool it is vital that the Perspective Grid is defined first. Choose View/Perspective Grid/Define Grids. Click New to add a new Grid to the list and set up with 1 Vanishing Point and with a Grid Cell Size of 100mm. Set the colours of the Grid to stand out against the colours in your illustration.



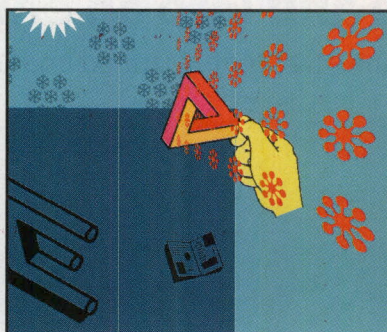
2 View the Grid by choosing View/Perspective Grid/Show and then spend some time putting the Grid in the correct place for the illustration. To modify the position of the Grid while in view drag the small diamond shape using the cursor after clicking on the Perspective tool.



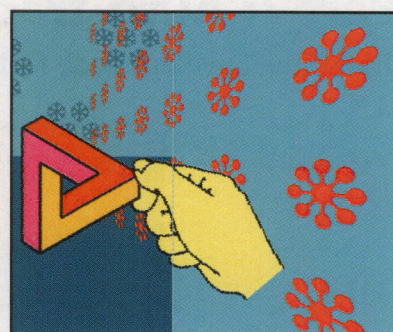
3 Open a new layer and import from the cover CD the file starblob.tif and then using the previous techniques of the Auto-Trace tool create a vector traced version. Change the colour of this to OC, 78M, 100Y and OC and delete the original.tif. It is important to create a vector version, as the Perspective tool will not work with bitmaps.



4 With the Perspective Grid in view, highlight the vector version of the Starblob, click on the Perspective tool and, with the right button held down, drag it to the right side of the Grid. Release the mouse and the Starblob sits in perfect perspective.



5 Duplicate the Starblob and position in the next square of the Grid. Keep going until as much as you wish is filled of the right-hand side with Starblobs. It will take time but will look very sharp. Once finished remove the Grid and hey presto!



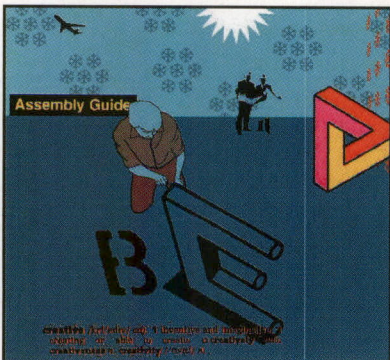
6 Place the Starblob layer beneath that of all the hand and 'impossible object' so it appears as a transparent wall of blobs! Enlarge and rotate the hand and object until they fit in the most visually pleasing position.

Part 10: Final touches and final artwork

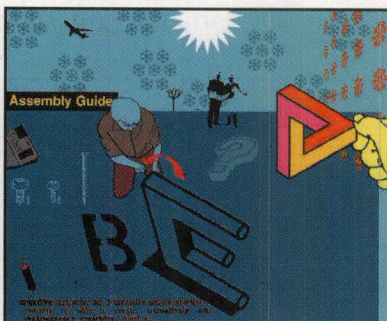
Adding some extra tricks and importing the final artwork...

Security tips

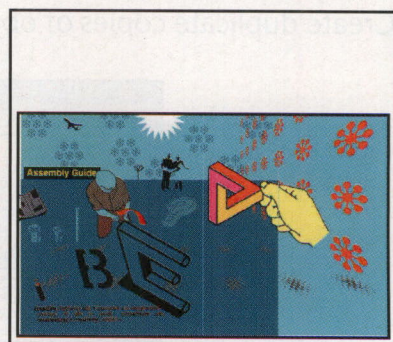
Knowing how to set up your artwork for print is crucial. Most illustrators protect their final artwork by exporting as a JPEG rather than hand over the raw FreeHand file. Even with layers locked mistakes can happen. Your artwork is your property and your client has no rights to change or alter the work in any way, unless they buy the copyright as well as the rights to reproduce it.



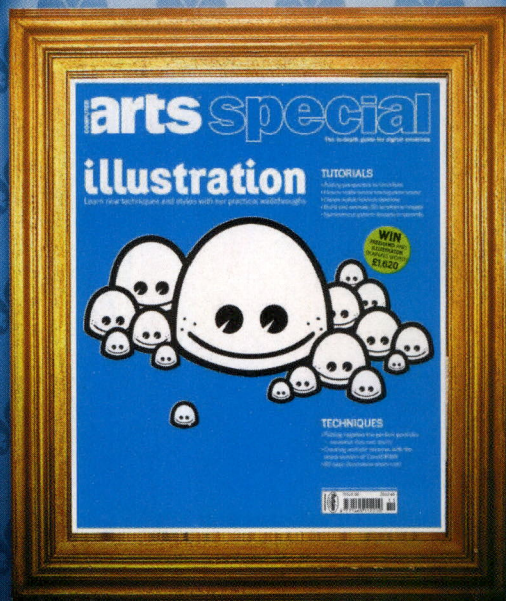
1 Using many of the skills that you have picked up so far, import the following images: assembly guide.tif and creative.tif which has been scanned from a dictionary definition. Scale, place and fill them according to the main illustration.



2 Import, scale, skew, fill and place the following images from the CD: question.tif, arrow.tif, dynamite.tif, screw.tif, screwside.tif, screw02.tif and tree.tif. With the file dots.tif create an auto-trace and using the Perspective Grid while holding the Down key drag it into positions on the 'floor' of the Grid.



3 Remove the Perspective Grid and check all layers are locked and in the correct order. It is a good idea to check that everywhere black is used it is made up from the CMYK mix, because when converting to a JPEG there will be a visible difference. Once done, put the kettle on, you've finished! **CD-ROM**



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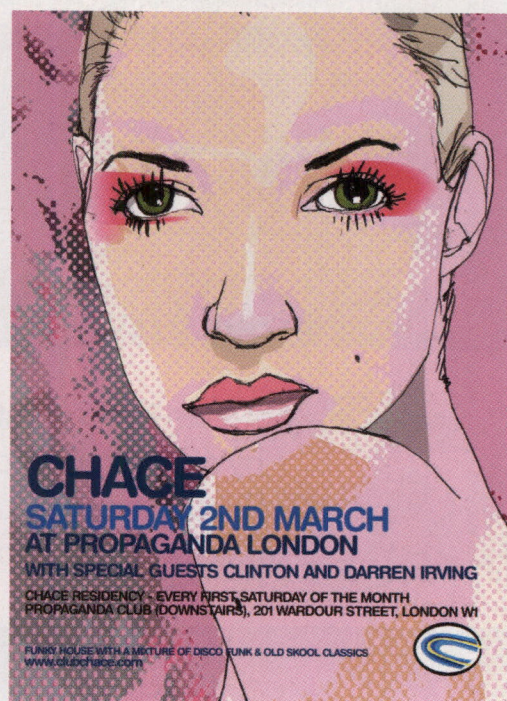
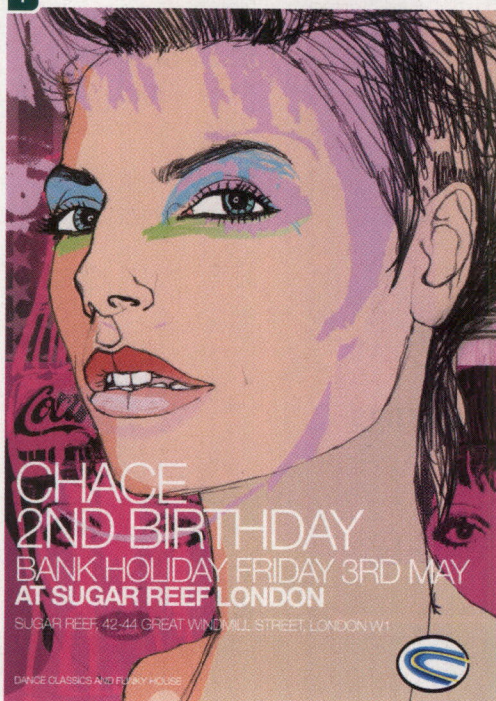


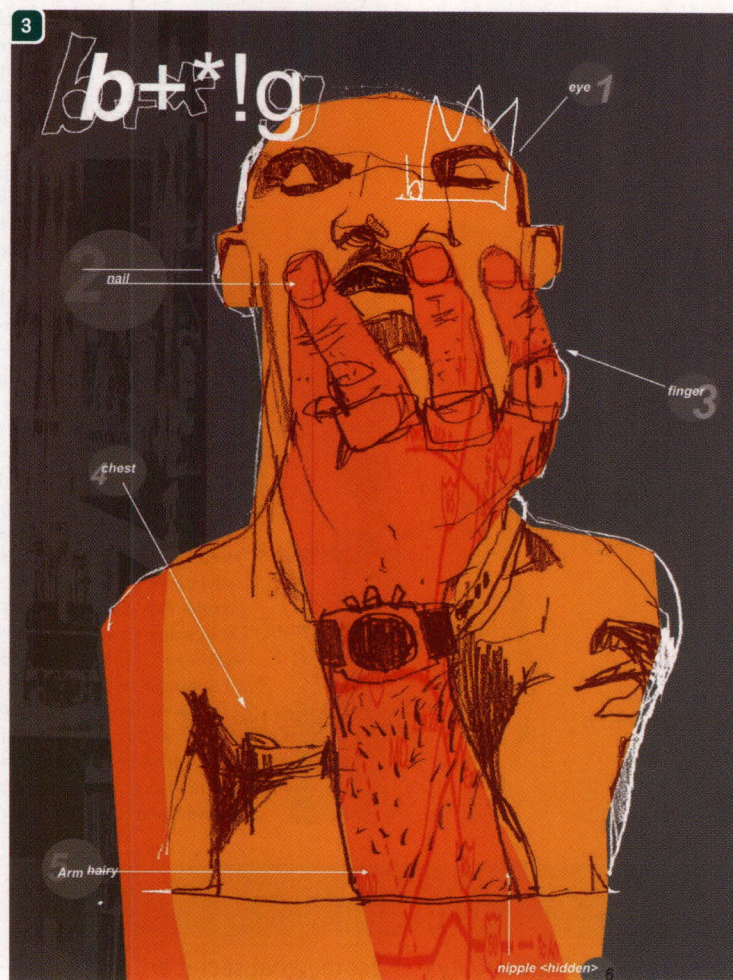
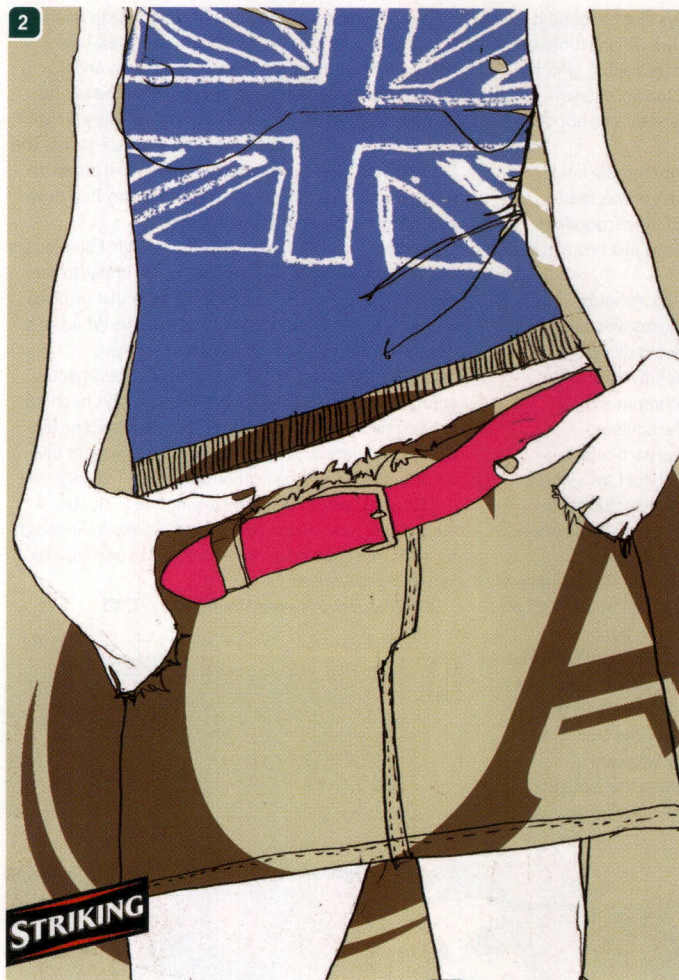
1

1. This series of flyers has been created with a combination of exporting line work from *Flash* to *Illustrator* and back again. The images have then been taken into *Photoshop* and layered with a scanned drawing. These experimental images received rave reviews from *Time Out* magazine. They use limited *Photoshop* effects, but the Gaussian Blur and the Stamp effects are enough to keep the images looking both alive and digitally created.

2. "This image was created to illustrate the people of today, the clothes they wear, and the way they converse and interact," says Patrick. The artwork was designed in *Illustrator* and then printed onto film to use on light boxes in bars and clubs.

3. The brief for this project was one word: Being. "From this I had to come up with different ways of representing the word in or out of context," explains Patrick. "I created a few images, from human beings to being hard. This image was one of the few selected for the magazine – it depicted the different body parts, like a medical piece but with a little extra."





Patrick Morgan

"There is never an end to knowledge with computers," says this London illustrator who mixes modern methods with older traditions to achieve his distinctive style...

For an illustrator, Patrick Morgan has a very peculiar plan for the future: "I would love to become a comedian at the Edinburgh festival," he says. He then goes on to explain that it's not merely the warmth of the spotlight or the smell of the greasepaint that fuels this dream. "To build my own production sets, do all the artwork, with projections going on everywhere, show reels, anything imaginable. It would be one big art scene."

In the meantime, Patrick is satisfied being one of the capital's most distinctive illustrators. He's worked for a range of clients, including Time Out, Sainsbury's, The Body Shop, MC Saatchi, British Midland and Getty Images. He's also done a mix of print and Web work. His approach features plenty of old-fashioned sketching and drawing, rather than sitting jockey-like on the *Photoshop* horse and flogging it for all it's worth.

In reality, however, Patrick's work is a combination of traditional, handcrafted graphic design and today's technology from the likes of Apple, Adobe and Corel. (See 'Patrick's working methods' for more on this.)

Early learnings

Patrick's route into the world of graphic art is perhaps as strange as the board-treading ambitions mentioned earlier. His dad was a programmer for British Telecom, and used to bring home software that included *CorelDRAW* and early versions of *Photoshop*. Of course, the young lad was fascinated with these virtual playthings, and soon found he could create and change his art very quickly and effectively using computers.

He had the choice of becoming a diver for Great Britain, but decided to stick to art, enrolling at

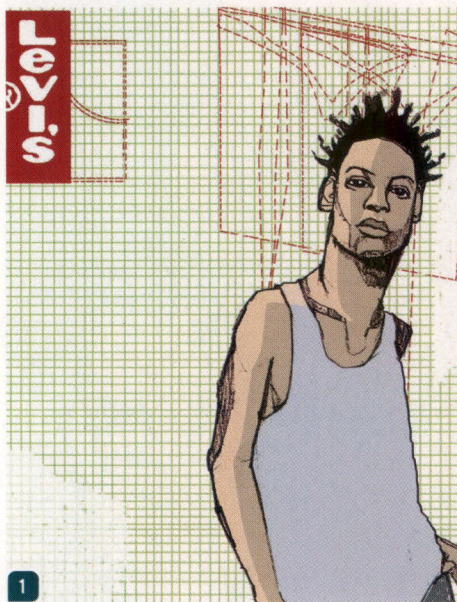
Kingston University where he gained a BA in Illustration and Graphic Design.

He recalls: "The most enjoyable part of University was life-drawing sessions, because you would have to bring your life model into a real life context so the final artwork created a scene rather than the usual piece of art. This was helpful for future commissions because illustrations usually have to depict a story or a scene."

He was also keen on printmaking, which gave him an understanding not only of the print production but it helped him to incorporate computers into his working processes with greater wisdom.

"My past experiences have helped me realise that there is never an end to knowledge with computers, and you should use them as a tool and try not to let them dictate the direction of artwork," he recommends.

Patrick describes his style as partly accidental. He >



always enjoyed drawing, but he says that he found it a bit of a struggle. He therefore started relying more on photography, and that led him to printmaking, which gave him a deep understanding of the art of layer processing. However, his graphic style came about purely by accident.

"[I was] doing a wood cut piece for the Big Issue," Patrick begins. "The sort of line you got was really different and interesting, so I tried to incorporate it into the drawing and from there I have just brought it from one area to another."

He cites the work of Alan Kitching as being influential in this area, as Kitching uses wood block text to create his work. Patrick assures us, however, that we needn't go quite so far to achieve the effect. "This technique can be done by a computer if you understand the initial elements," he advises.

There are a number of jobs he has particularly enjoyed doing. "I've just finished a job for Levi's which was really cool," he says. "I managed to collaborate with the other designer well, which always helps when creating a piece of design. One of my earliest advertising jobs for Siemens mobiles didn't even have a brief — they just said it was a new phone called M35i or something, small in size and great for outdoor adventure sports. I did two for them to choose from and they bought both. It's great if you can get jobs like that!"

He's also enjoyed his work for Channel 4 for the series *Teachers* that was featured in Time Out. "The turnover was very fast and the work was very spontaneous, so producing something that both the viewers and I liked was a bonus."

Though he likes these sorts of jobs, he admits that working with various art directors is a mixed bag. "Some, for example, are stuck in their ways and already have illustrated the image in their head," he explains. "Other art directors will let you know what they want, which can really save a lot of heartache. The Editor from Time Out, Sandy Suffield, was a pleasure to work with and really pushed me to let my hair down and do that extra special something."

Besides his one-man show in Edinburgh, Patrick says that he'd love to work with animators. He hopes to see some bigger clients commissioning work that involves projectors, lighting, show reels and the like. While he's done such work in bars, he believes that more established brands could stand a more experimental approach to some of their briefs. He also says he'd like to become a household name within the art scene like Graham Rounthwaite or Paul Davis, then go more into art direction within the fashion side of the industry.

But until then, he's likely to continue to do the advertising jobs, which he says are lucrative. Although he adds that good editorial jobs are also particularly satisfying to work on.

Keep your eyes peeled for his work. **ca-s**



You can visit Patrick Morgan's Website at [w] www.patrickmorgan.co.uk or telephone him on [t] 07957 687833. His work is featured in the book *Typo 5 Graphic Fusion*, which is due for release this autumn. You can also see an exhibition of his work at the Propaganda Bar, Wardour Street, Oxford Street End, London in November 2002.

Patrick's working methods

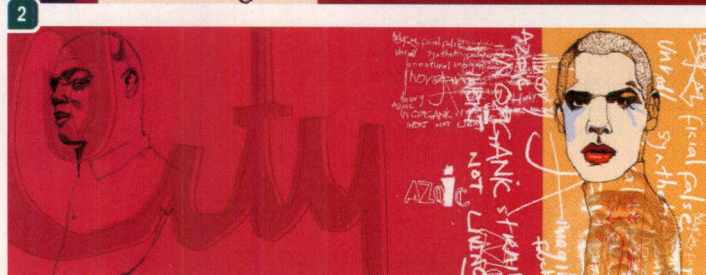
Designing Morgan-style is a somewhat secret art. Here's what we could find out...

Patrick's work involves mixing plenty of traditional techniques with today's technology. He usually starts with a sketch or a photograph, which he then scans into one of his two computers. One is a Pentium III-equipped Compaq ENS running Windows 2000 Professional, and the other is an G4 Macintosh with dual 450MHz processors running OS X. His software of choice includes *Photoshop* and *Illustrator* for the most part. He also likes to use *CorelDRAW* and *Flash* to add different textures to his work. He declines to give too much away about his favoured software plug-ins. "I try to use few plug-ins so people have to struggle when trying to decipher how my work is done," he says before adding, "but alien skins are fun." He also admits to using the rubber stamp tool a lot, but says that that seems to be getting overused these days.

He concludes: "I really like the new 3D packages like *Softimage*, *Lightwave* or *3ds max*, but I have yet to introduce them into my work."

1. "This illustration is from a series of four to be used for a new promotion for Levi's," explains Patrick. "I can't say any more than that yet, but keep your eyes peeled." Patrick converted the illustration into Flash images for a promotional presentation for the client. "With this image they wanted to keep it simple," says Patrick, "but also have that worn element which is being massively promoted at the moment. Keeping the same theme as the Engineered artwork, the people took a more illustrative direction rather than photographic. The technical line work was created in *Illustrator* with layers exported across from *Photoshop*. The worn effects were created by scanning in blown-up textures from old Xerox photocopies."

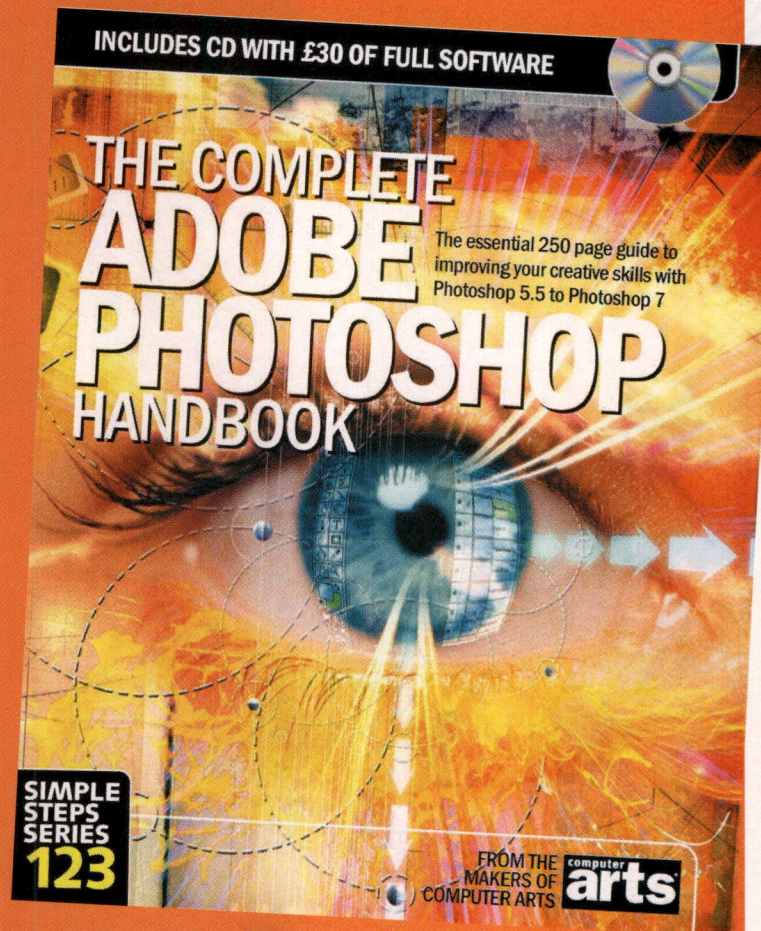
2. This was for the magazine *Artificial*, so Patrick chose different artificial areas to mix up for the artwork: artificial intelligence, artificial bodies and so on. "I scanned in words, scribbles and graffiti text like they were some kind of password or connection with the other world," explains Patrick. The images used were exported from *CorelDRAW* and finalised in *Photoshop*.



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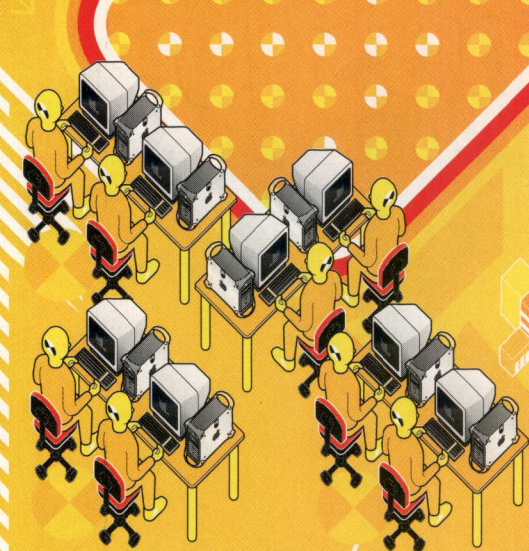
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Files on disc

The screenshots in this tutorial can be found in the Tutorial\Composition folder.

The art of digital illustration is not about the layers you use or even the plug-in effects you can use in your desired program; it's all about intelligence and having reasons for the use and positioning of graphic objects. You must also be aware of colour co-ordination — always restrict yourself to a colour palette of around four or five colours rather than a whole wash of them,

because there's nothing worse than seeing an illustration which looks awash with too much colour.

Here at Identikal, we produce all of the elements in any of our illustrations, first by hand and then accurately in a vector program like *FreeHand*. In this tutorial we show you how to place objects and maintain colour co-ordination within an illustration, to give it a composition that looks right.

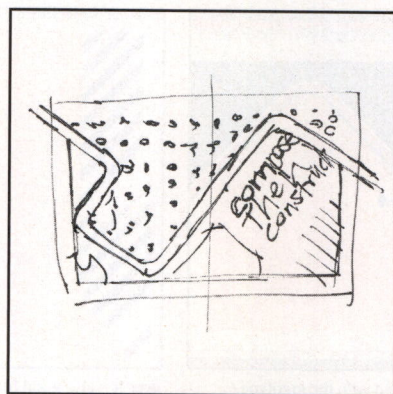


Part 1: Initial composition

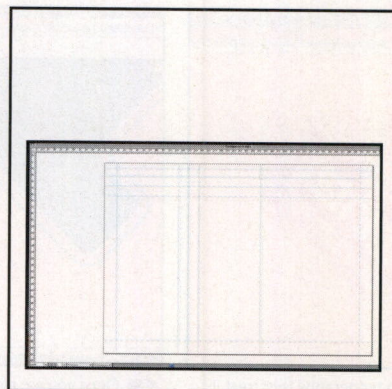
Start things off by sketching your composition and creating a graphic divide...

Colour co-ordination

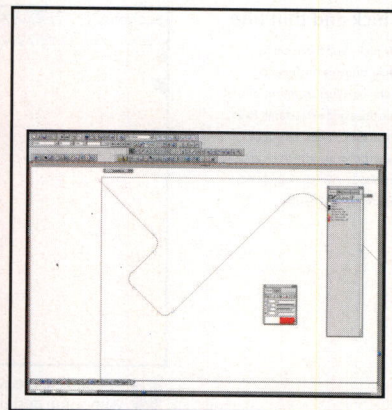
We like to look to nature for inspiration in colour, and a lot of our illustrations have colour palettes based on animal markings and our favourite insects. Pick up a book from your local library and be inspired by mother nature.



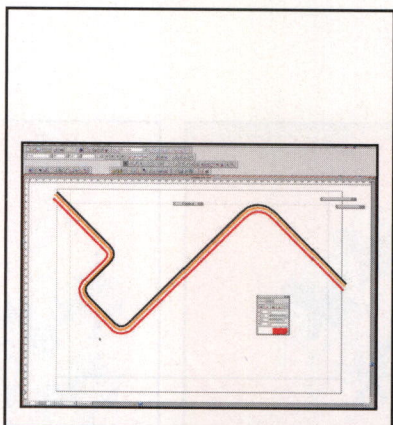
1 Always begin a project by drawing (by hand) a basic compositional sketch. This will maintain simplicity within your image, and will stop you from going out of focus with your composition, which is the most important structural part of your illustration.



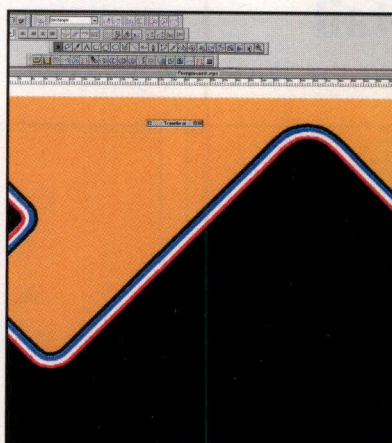
2 Once you have made sure your required page size is correct, you should create a border around it because this will help you to keep graphic objects away from the edge of the illustration. Only coloured plains and shapes that enter the illustration should enter the outer margins.



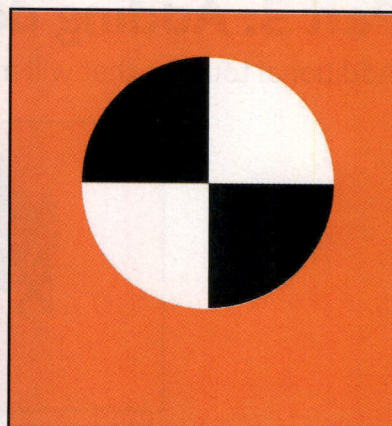
3 The base of your illustration starts with a 'graphic divide', which can be made with a simple line, or a large shape. This device is important in your composition as it gives you a choice of hierarchy, and creates a path for the eye to follow.



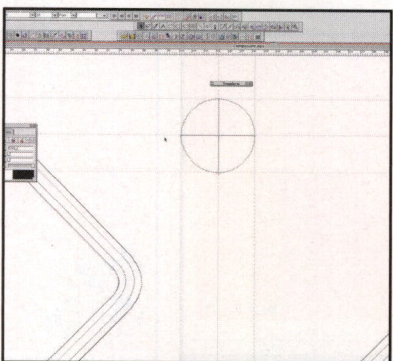
4 To intensify this divide you could add a retro touch to make it more pleasing to view. It also gives your work a 'road' effect, which is great for composition because the eye will naturally follow it across the illustration.



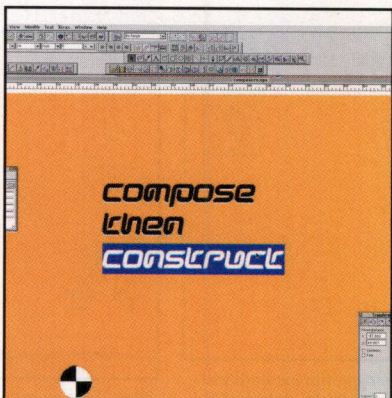
5 Keep this to a minimum of three different hues. Simply shade both halves of the graphic divide with your desired colour (this doesn't have to be the same colour for both sides).



6 The next stage is to decide on the graphic theme of the illustration, because this will provide you with ideas for graphic shapes and icons which you can work with. Our overall chosen theme is a 'crash test dummy course' in illustration.



7 With such an interesting theme there are many things you can do. We drew up a crash dummy symbol, and some warning symbols. Graphic objects provide detail to the composition of the illustration, and can enhance the overall visual effect.



8 Type is a major part of any illustration we do. Not only does it give reference to what the illustration is about, it also provides a strong focal point which will add hierarchy to the final image.



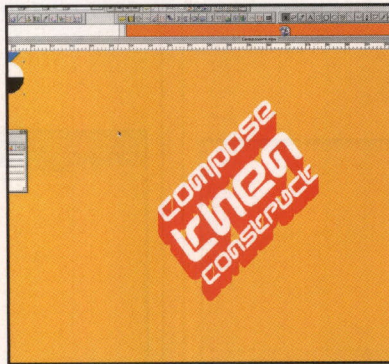
9 At Identikal we always use our own typefaces in our work. Here we have used the Sharp typeface. We have also made sure that the message is readable and actually says something – rather than being just a visual gimmick. ➤

Part 2: Creating a logotype

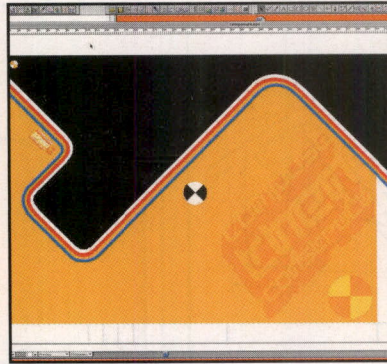
Turning type into a logo...

Thick and thin line

We picked up this technique while studying engineering technical illustrations. Thick and thin lines add extra depth to an illustrated object. It's worth experimenting with thick and thin lines to see which weights have greater optical depth.



1 The next stage with typography is to treat it with some design respect. Don't just type it out and leave it – treat your type message as a logo. Give it Composition, and as this will be near the top of the hierarchy, it should be instantly recognisable.



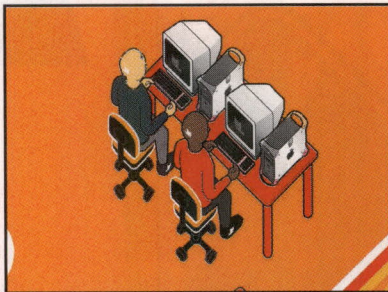
2 Once you are pleased with the logotype, experiment with putting it in various places. This is good practice for understanding the structure of your image, and will help out a lot once you get to the latter stages of the piece.



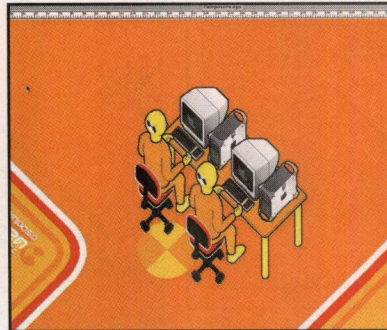
3 It is also good for you to duplicate the logo, and have a secondary, small logo. This gives you added depth and will bring you onto adding detail with other graphic devices. It also shows the typographic construction as a logotype.

Part 3: Adding detail

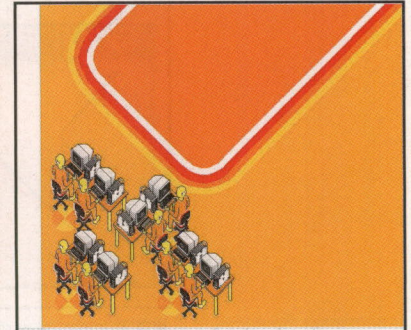
Additional touches that will make the illustration your own...



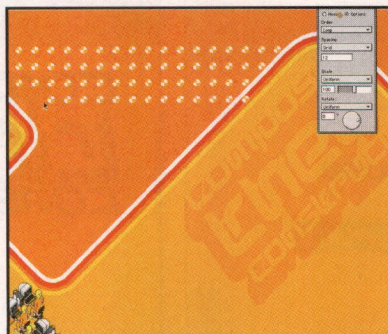
1 For added detail, an illustration that reflects your theme can give the image a more personal touch. We have drawn some characters at a 45° angle, with added features like a table and computer. These elements will rubber-stamp your illustration as your own, something that we call 'signature blocks'.



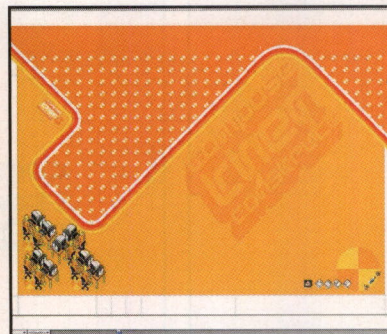
2 Once you're happy with the graphic drawing, the next thing you need to do is choose the right colours that go well with the characters. This is the point when you can begin to select your final colour palette.



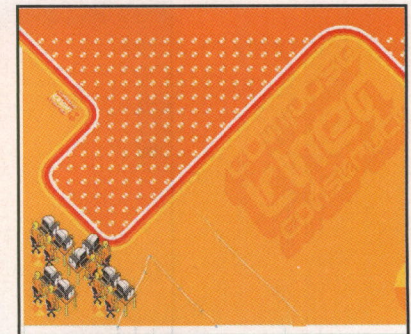
3 When you're satisfied with your colour palette choice, apply all the colours to the main features of the whole illustration. You will now see the image come to life.



4 Create graphic patterning with the logos you designed earlier, in co-ordinated colours. This is easy to do with the Graphic Hose tool. It allows you to use any graphic object to paint with. All you have to do is add the object to a new Graphic Hose cell and ensure the hose has been set to Loop on a Grid.



5 Once you have perfected the positioning of the graphic pattern, make sure it is not too overpowering. It is only enhanced detail, and if it's not treated correctly then it can destroy your compositional harmony.



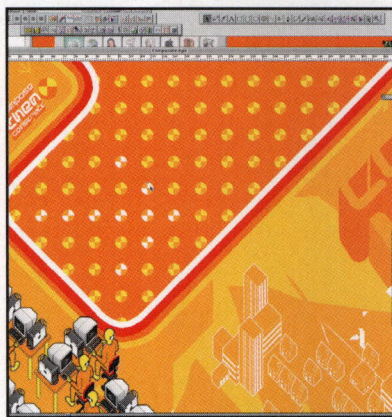
6 Now that the image is 'composed', you can have fun constructing or deconstructing the illustration. Here we have used the Cutting tool in *FreeHand*. By cutting up the coloured areas, you can imitate the effect of decay or creases on a piece of paper.

Doodling

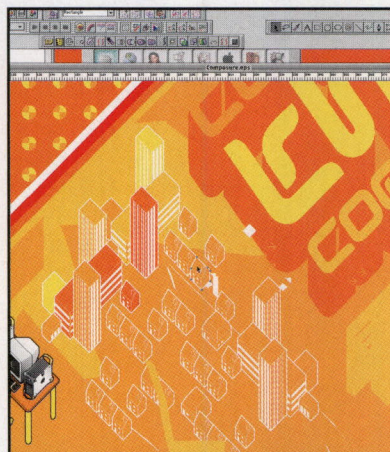
Always keep a pen and paper close to hand at your desk or workspace. Doodling is fun and can be the focus of originality in your Illustration work. It is a loose way of inventing shapes and textures, and can inspire you in future work. The Identikal sketchpad is the quickest and most inventive source for originality in our work.

Keep it simple

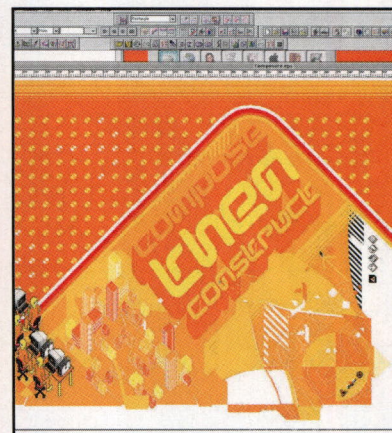
We always try our best to simplify anything we do, and are totally against using the next 'trendy' filter or effect in Photoshop or Freehand. Remember, we are illustrators and we shouldn't be reliant on machines to do our work for us. Respect your machine, and use it for what it is: a tool.



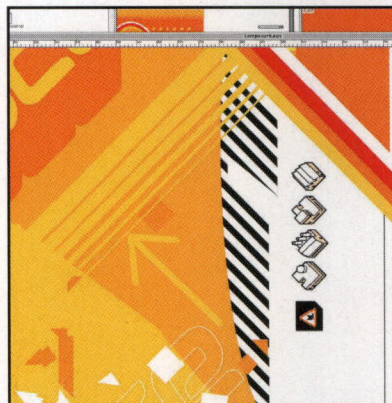
7 This can then lead on to adding graphic objects like chevrons and, in this instance, buildings. All these shapes will add detail and depth to the image as a whole but must not overpower the core elements. Try to use the same colour palette as demonstrated.



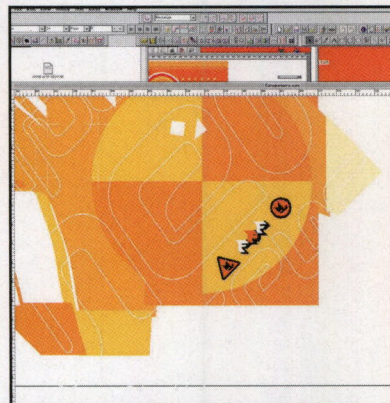
8 Using the same colour palette, continue to perfect the graphic shapes you have placed by adding darker/lighter shades to them. This will add a sense of distance and texture.



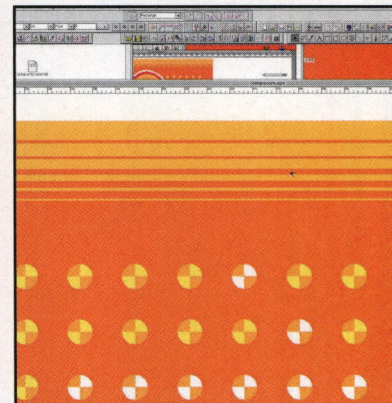
9 Fine-tune your work by ensuring that your core elements are not obstructed by secondary objects. Do this by either deleting them if they are too noticeable or placing them behind the element they cover.



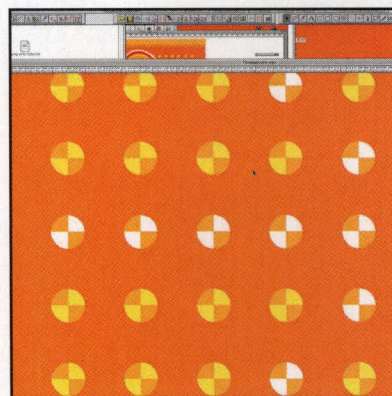
10 Add mini graphic touches that will add extra details to your border. Here we have added our factory logo signature, which we apply to almost every illustration we do.



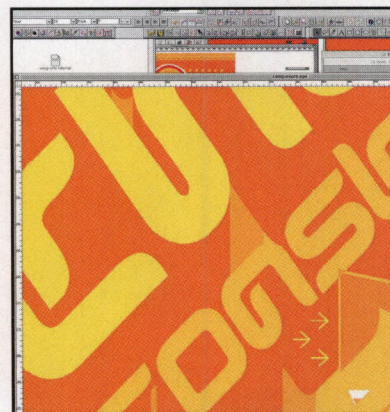
11 With the typography we have copied a version and turned it to white outlines. Again, this has been added to weigh up the textures to bring the viewer's eye to the logotype.



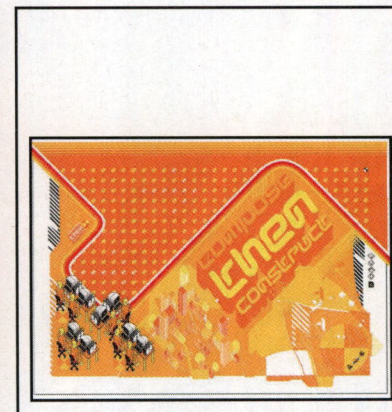
12 With the top of the image we have added lines that have been coloured in a lighter shade to the background. By changing the thickness of them, it will keep the background to the back.



13 We changed the colour of some of the background pattern shapes to add arrows when viewed from a distance. These arrows aren't recognisable at first, but again have been placed to train the eye toward the first object of the hierarchy.



14 With the logotype we added arrows and shades of colour to give it a ruptured look. The whole feel of this illustration is construction and industry, so texture like this gives it this edge.



15 The last stage is to look at the overall final piece and make sure that there's a hierarchy within your composition. Make sure it looks original, solid and well colour co-ordinated. **canva**





Combining 2D and 3D

Learn to add compelling 2D illustrations to previously rendered 3D environments using our expert tutorial...

There are numerous tools out there for artists of all disciplines. For the digital artist there is 3D, 2D pixel-based imagery, and 2D vector-based imagery. Many artists stick to one discipline at a time, while others tend to combine them. There is no doubt that the digital realm lends itself to this sort of experimentation more easily than the tactile realm enables you to combine, say, oil paints and watercolours. Finished renderings and pixel art are combined easily in *Photoshop* and can produce some very interesting results.

Derek Lea, one of our leading illustrators, has often combined 3D imagery with 2D photographic art. However, it took a suggestion from *Computer Arts* designer Esther Lamb to get him to try blending together his 3D work with his highly illustrative 2D

work. When Esther commissioned an opening illustration for the 3D skills section of issue 74, she cited two examples: one was very three-dimensional and the other was very flat and illustrated. She suggested combining the two styles. The result was quite compelling and inspired Derek to experiment further and work out a method for this style of art. This new process is explained in detail over the following pages, as we show you how this fantasy image was created. ➤



Artwork and expertise for this tutorial is supplied by Derek Lea. [e] derek@dereklea.com, [w] www.dereklea.com. This tutorial was created using *Photoshop 7*.



Files on disc

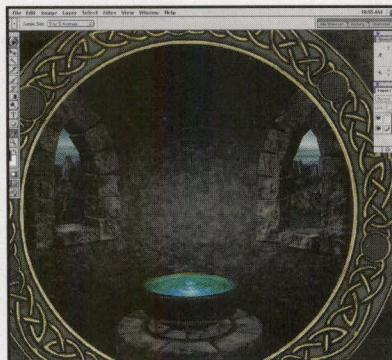
The files you need to complete this tutorial are in the Tutorial\2d 3d folder. These files are for personal training purposes only, and not to be reproduced elsewhere.

Part 1: Getting started

Starting with our background scene, we'll import a sketch to use as a template and create a sharp edge for the figure...

Sketch options

You may feel that printing out the background and sketching over it on a sheet of paper is a roundabout way of doing things. In a way it is; we are taking something out of the computer in order to put something back into it. There are other ways to do this without leaving the box. For tablet users you could sketch on a new layer using a fine brush in *Photoshop*. Another excellent way is to bring your rendered scene into *Painter* and sketch over it using a pencil brush and the tracing paper function. It really is a matter of personal preference. Derek prefers to draw in the tactile realm using a felt-tip pen and then scanning the sketch, but do what you feel is most natural.



1 Open the file Background.psd on the cover CD. You will notice that there are two layers: one is the background and the other is the round frame. Most of the imagery you see was previously rendered using *Bryce 5*, and the area on the background layer that lies outside the ring was created using scans in *Photoshop*.



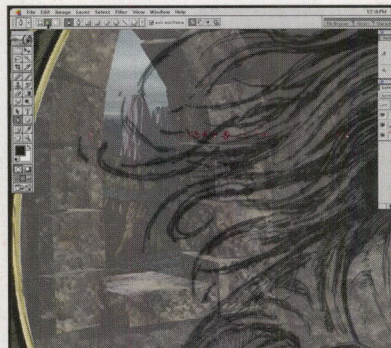
2 Open the file Sketch.psd. This will be your rough guide for the illustration. To ensure that the figure looked like he belonged in the background we actually did a colour inkjet printout of the 3D background. Then a sheet of tracing paper was placed over the printout and the figure was drawn on to the tracing paper and then scanned.



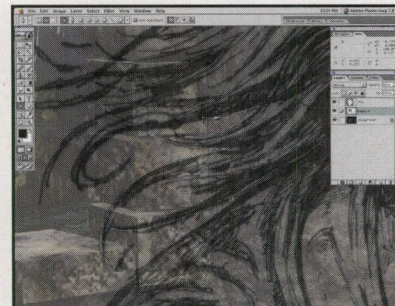
3 Select All (Command+a), and copy (Command+c). Now go ahead and close the Sketch.psd file since you won't be needing it anymore. Select the Background layer in the Layers palette of the Background.psd file and Paste (Command+v). This will create a new layer on top of the background layer but beneath the ring layer.



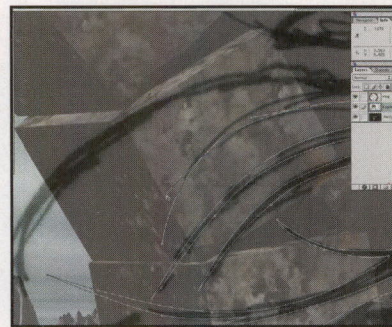
4 Rename the layer 'sketch' and reduce the layer opacity to around 45% so that you can see the background underneath the sketch. Use the Move tool to reposition the layer so that the figure is centred within the background scene and it looks like his hands are hovering over the bowl of liquid.



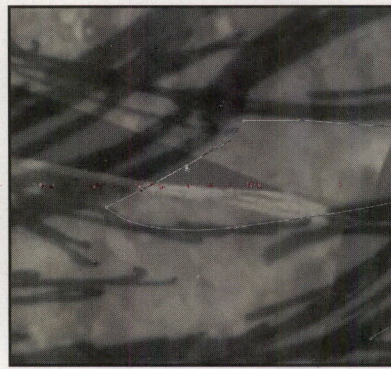
5 Since we want a nice sharp look for this illustration we're going to use the Pen tool to draw some closed paths. Select the Pen tool from the left. And in the tool options bar at the top make sure you choose the Paths button and not Shape Layers or Fill Pixels. Zoom in close on a section of the hair.



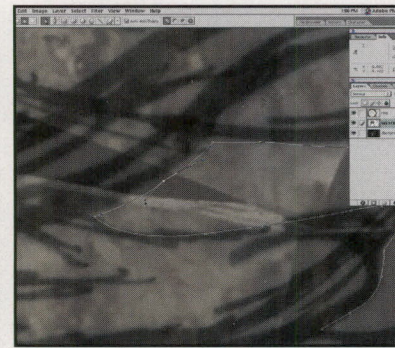
6 Using the Pen tool begin to draw a path to define the outside of the figure. Leave the inside areas for now, because at the moment we just want to create a closed path to encompass the entire figure. Click and drag with the Pen tool to create editable Bézier curves. Enabling the caps lock on your keyboard will change the Pen tool icon to a crosshair for better accuracy. Don't be afraid to zoom in even closer if you like.



7 Feel free to improve upon the sketch when you are creating the path. You can add or remove hair or change things along the way – it's only a sketch at this point so take all of the artistic licence you want. Nothing is carved in stone, and keep in mind that paths are entirely editable after the fact. So you can tweak things even after the closed path is finished.



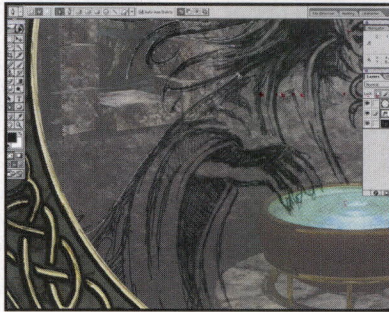
8 To edit one of your Bézier curves, hold down the Command key while using the Pen tool and it will switch to the Direct Selection tool. Use the Direct Selection tool to select the point on the curve you wish to edit and the Bézier handles will appear. Click and drag the handles to adjust the curve.



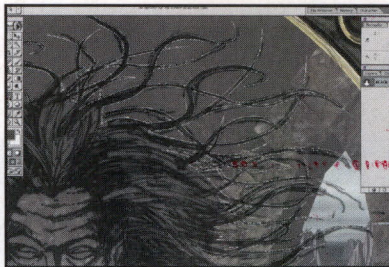
9 Holding down the Option key while using the Pen tool switches it to the Convert Point tool. The Convert Point tool is handy if you want to adjust one portion of the Bézier curve without affecting the other side. You can click and drag on a handle using the Convert Point tool and move it wherever you want without affecting the other handle.

Adding and subtracting points

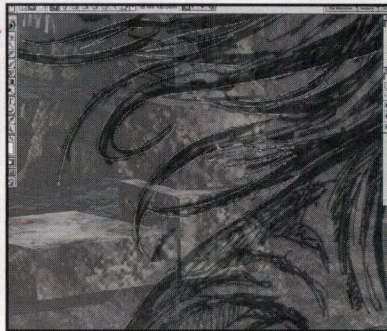
When you draw a Bézier curve you may end up with a point or two on the line that you would prefer wasn't there. While using the Pen tool, there is a quick way to subtract points. You will notice that as you draw a path with the Pen tool there is an X at the bottom right of the tool icon. With your path selected, float the cursor over the top of a point on the path and the X will turn into a minus sign. When you see this, click on the point and it will be subtracted from the path. You can also add points to a path using a similar method. With the path selected, float the cursor over a segment of the path, not a point. You will notice the X turns into a plus sign. When you see this, click on the line segment and a point will be added to the path where you click.



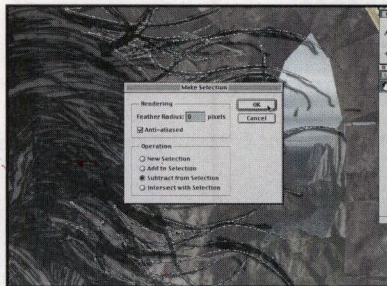
10 Continue drawing a path to outline the figure; go down and around the shoulder and elbow to the right. Then continue left along the inside of the circular frame so that the path is overlapping the circular frame. Don't be too fussy because this area will be hidden by the ring layer. Finish drawing your path up the left shoulder until it connects with your starting point.



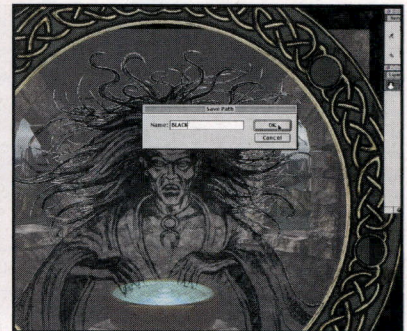
13 Command-click the path icon to generate a selection from it. Notice that your holes are not punched through the selection. To subtract the holes, click the path icon to make it visible. Use the Direct Selection tool to select a hole. Hold down the Shift key and click on all of the other holes to select them too.



11 Now we want to draw closed paths around areas within the outer path that will show the background. Sort of like holes. Go around through the hair and draw in closed paths where all of the holes should be. Don't worry about drawing closed paths anywhere else at this point; concentrate only on the holes.



14 Hold down the Option key and click the load path as a selection button at the bottom of the Paths palette. Set the Feather Radius to 0, make sure anti-alias is checked, and set the operation to subtract from selection. This will subtract the selected path segments from the current selection.



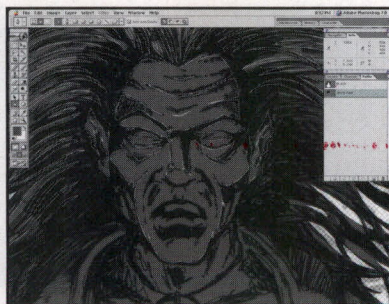
12 When you've finished creating all of the closed paths for the holes throughout the hair, save your file. You have put in a fair amount of time so far and it would be a shame to lose anything, so make a mental note to save often throughout the tutorial. In the Paths palette double-click your path icon and name it Black.



15 In the Layers palette, create a new layer under the Sketch layer but above the Background layer. Fill the current selection with solid black and deselect (Command+d). Turn off the visibility of the Background layer so that there is enough visible contrast to clearly see the edge of your new black shape. Double-click the name of the layer and change it to black.

Part 2: Inside the figure

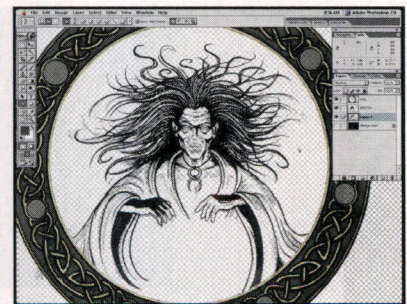
Still using the Pen tool and Bézier curves, we will now add some detail inside the shape of our figure...



1 Make sure that the Black path is not selected because we don't want to add to it; we want to create a new path when we use the Pen tool. Use the Pen tool to start to draw a series of closed paths surrounding the lighter areas inside the figure. This time we want to enclose the light areas with paths, not the dark areas.



2 At this point, focus on just surrounding the light areas with closed paths. In areas where there are things like black details inside white areas, just leave them for now. For example, leave the mouth area as we'll get to that soon enough. Focus on carefully surrounding the lighter areas.



3 Name the path and Command-click the path icon in the Paths palette to generate a selection from it. In the Layers palette, choose the Black layer and, with your current selection still active, hit the Delete key, then deselect (Command+d). This will remove all of the light areas that you have enclosed in paths from the Black layer.

Inside the figure continued...

Take your time

The most important part of this illustration technique is the paths that you draw. So be patient and meticulous at this point in the process. Take your time and make sure you do a good job, make some nice smooth curves, and make absolutely sure that all of your paths are closed otherwise you'll have trouble making selections from them. If you rush through this phase of the image, you'll regret it later on. No matter how nice a job you make of colouring in everything, if the outlines look rough or uneven, the image will not be a success. So get yourself a cup of coffee, put on some music, and sit down and spend the necessary time doing it properly.



4 Use the Pen tool to draw a series of closed paths around the dark areas that lie within the light areas you just enclosed. Things like finer details around the nose and chin, wrinkles in the fabric and so on. When you get to the upper lip, where there is a white area completely contained within a dark area, just surround the dark area and leave the light area for later.



5 Name your path and Command-click the icon in the Paths palette to generate a selection from it. With this selection active, make sure the Black layer is selected in the Layers palette. Fill the active selection with black and deselect (Command+d). You now have some nice black details throughout the figure.



6 You can turn the sketch layer off if you like, since now it is pretty obvious where the lip will go. Use the Pen tool to draw the areas where the lip will knock out of this black shape, go ahead and add some teeth if you like. Make a selection from the path and, on your Black layer, hit the Delete key to remove the black from this area. Deselect.

Part 3: Adding colour

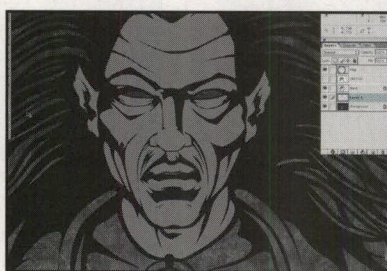
Now we'll add some colour and shading to our figure, making it look more like it belongs within the scene...

Choosing colours

With this type of illustration we are not really after realism *per se*. 3D art can look realistic if done well, but this style of 2D art is not realistic in the slightest. That said, the real issue here is harmony. The two styles of illustration must look like they belong together in a way that is the key in combining two very different styles. We don't want it to look as if the 2D art is an afterthought just stuck on top; we want the image to work together as a whole. One of the ways to achieve this is by the use of colour. Try to select colours from the background image to use in your 2D art. There will be areas where you may want to introduce new colours, so try to introduce colours that compliment the existing colours within the image. What you really want is for the illustration as a whole to share one common colour palette.



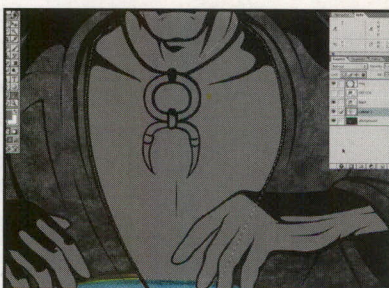
1 Enable the Lock All function on the Black layer in the Layers palette so that you don't accidentally modify it now that it's finished. Select the Magic Wand tool from the toolbox and click on an enclosed area like the face, hold down the Shift key and click on other enclosed areas of the face and the ears and neck to add them to the selection.



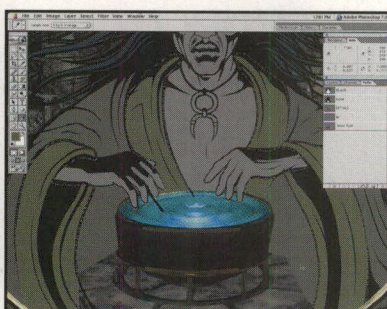
2 Choose Select>Modify>Expand from the menu and expand the selection by two pixels. Switch on the visibility of the Background layer and create a new layer underneath the Black layer and name it Colour 1. Use the Eyedropper tool to select a warm grey colour from the background and fill the active selection with it on the new Colour 1 layer. Deselect.



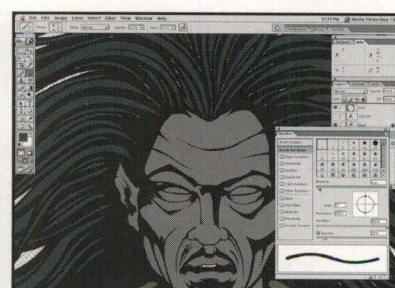
3 Use the same method to fill the hands in with the same colour. Also use this method for enclosed areas of the hair, but this time only expand the selection by one pixel since it will swell outside the black outline. Sample a blue colour from the water in the window of the Background layer and fill the selection with it on your Colour 1 layer.



4 For areas like the chest that are not enclosed, you will not be able to use the Magic Wand method. Instead, use the Path tool to draw a selection around the area you wish to fill. You don't have to be too fussy since the overlaying layer of black line work will give the impression of a nice sharp edge. Generate a selection from the path and fill it with colour on the Colour 1 layer. Deselect.



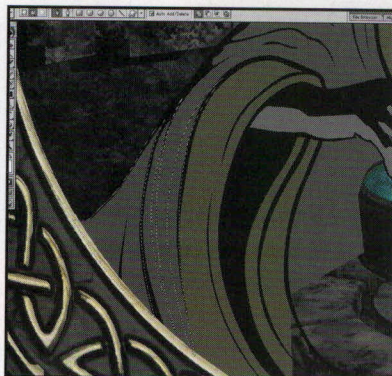
5 Use this same method for adding colour into the robe. First, do the sleeves and shoulders, and then do the trim as a different colour. Don't be too fussy about the area around the scrying bowl – it can be rough, but make sure it overlaps the bowl and the pedestal. We'll clean up the edges in this area later.



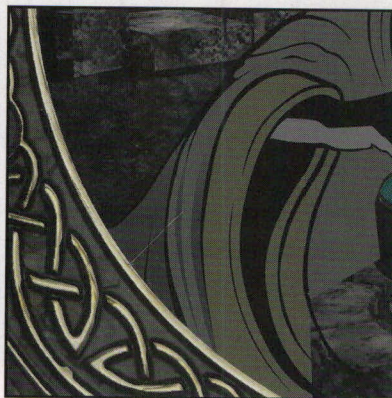
6 Switch off the Background layer for a moment and have a look at what is happening in the hair area. You will notice that the filled selections of colour are not quite perfect. To fix this, select the Brush tool and choose a hard edged brush of around 8 pixels in diameter and paint with 100% the same fill colour on the Colour 1 layer. Use this technique to fix areas like this throughout the image.

Lighting subtleties

When it comes to adding highlights and shadows to your figure, pay attention to how the lighting is in the 3D scene. When this scene was created there was a light source facing the area where the figure is now, just slightly above eye level. There was another light source sitting above the scrying bowl, shining up. Keep this lighting situation in mind when creating highlights and shadows on the figure. Again, we are not after total realism here, but if you pay attention to details like lighting then it will make the 2D art and the 3D art seem more integrated.



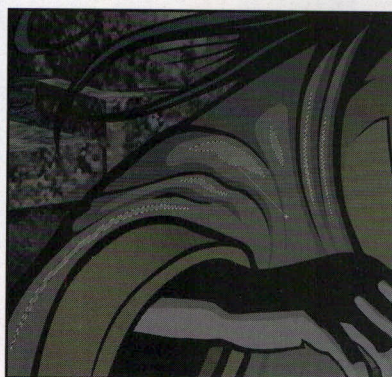
7 When you have finished adding in all of your flat colours – including the teeth, eyes, and medallion – create a new layer on top of Colour 1 and name it Colour 2. Now it's time to create some shadows in the figure. Draw some closed paths to the lower left area of the robe, where some darker shading would occur, and generate a selection from the paths.



8 Select the Gradient tool, specify the foreground to transparent function, and a radial shaped gradient in the tool options bar. Select a darker version of the colour you are overlapping from the picker for your foreground colour. Click and drag within your selection to introduce a gradient of darker colour as a shadow.



9 Now, use this technique to apply shadows in all areas of the figure: his robe, face, hands, etc. Apply all of the gradient shadows on the Colour 2 layer. Leave the hair alone as it is already dark enough and doesn't need any shadows – we'll add a few highlights next.



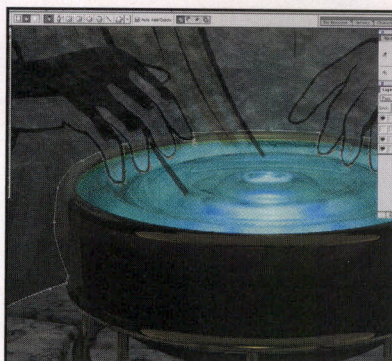
10 Right, now for the highlights. Draw some smaller closed paths in areas where you think highlights should occur, and use the same type of gradient to blend in lighter versions of the underlying colours to selections created from your paths. Do the entire figure just like you did with shadows, but leave some spaces to introduce some blue highlights cast from the scrying bowl.



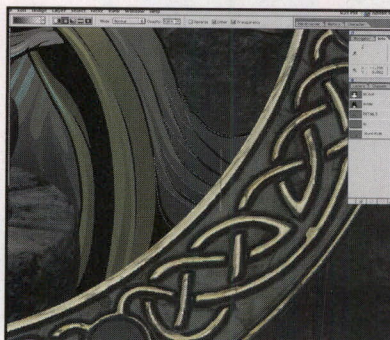
11 Now for some highlights caused by the bluish glow of the scrying bowl. Start by drawing some closed paths in the underside of the hands. Generate a selection from the closed paths and on a new layer, use the radial gradient with a foreground to transparent setting to gently blend some blue inside the selection. Use the Eyedropper to sample some blue from the scrying bowl.



12 Name the layer Colour 3. Apply this same technique and principle to add this effect throughout the image where appropriate. Places like the robe, and the underside of his nose and chin. Create a new layer set and add the Black layer and your three new Colour layers to the set in their current order.



13 Reduce the opacity of the layer set to 40%. Use the Pen tool to draw a closed path around the pedestal and the scrying bowl. Be careful not to include the finger tips inside the path, draw around them carefully. Generate a selection from the path and, with the layer set selected, from the menu choose Layer>Add Layer Mask>Hide Selected.



14 Return the opacity of the layer set to 100%. Inside the layer set, create a new layer just under the Black layer. We are going to add some smaller darker shadows on this new layer using the same method of drawing paths, generating selections from them, and then using gradients inside the active selections – use a fairly dark foreground colour for these.



15 Open the file 'pieces.psd'. There you will find the black outlines for all of the little icons that appear on the celtic ring. Go ahead and bring them in one by one, resize them and use everything you have learned thus far to add some colour and finish off this illustration correctly. **Case**





Illustration: Jason Arber [e] jason@pixelsurgeon.com

Vectorize with Streamline 4.0

It's even easier to create vector artwork by tracing photographs in *Illustrator*, Adobe's powerful drawing application...

Nothing screams hip at the moment more than a photograph traced in a drawing application such as *Illustrator* or *FreeHand*. If you thought this technique was beyond your capabilities, think again. Joining this elite band of vector illustrators is easier than you might imagine once you have the inside scoop.

Armed with nothing more than a photograph of your grandmother and a copy of Adobe *Illustrator*, you can churn out stylish artwork that will make you the envy of your friends and pretty much guarantee you a place at art school.

Tracing photographs has applications beyond the current vogue for vector illustrations: the technique can be used for recreating logos from scanned letterheads or reducing the file size in a Flash movie by using an image converted to vector paths rather than a photograph.

Over the next few pages we will explore many different methods of converting images to vector artwork, using *Illustrator*'s built-in automation, Adobe *Streamline*, and by hand using *Illustrator*'s Pen tool. Once we have converted the photographs we will look at some of the options available to modify the artwork further and how the new vector images can be used in *Photoshop* or turned into Flash movies. ➤



Expertise provided by Jason Arber. You can contact Jason at [e] jason@pixelsurgeon.com and view his work at [w] www.pixelsurgeon.com.



Files on disc

The files required by this tutorial can be found on the cover CD in the Tutorial\Vectors folder.

Part 1: Let the computer do all the work

Take the strain out of tracing images by using *Illustrator's* Auto Trace tool...

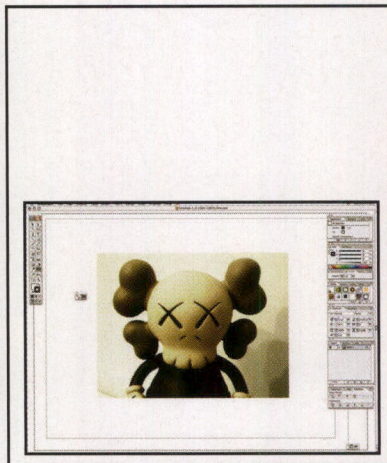
Why not use Flash?

Although the tools in *Flash* cannot hope to match those found in dedicated drawing packages such as *Illustrator*, *FreeHand* or *CorelDraw*, Giulia Balladore has found they are just what she needs to create incredible vector images. Starting with contours, she fills the areas with linear and radial gradients working over several layers. Her boyfriend is a Web designer, so *Flash* was lying around, but she concedes that it maybe wasn't the best choice for someone who just wanted to draw.

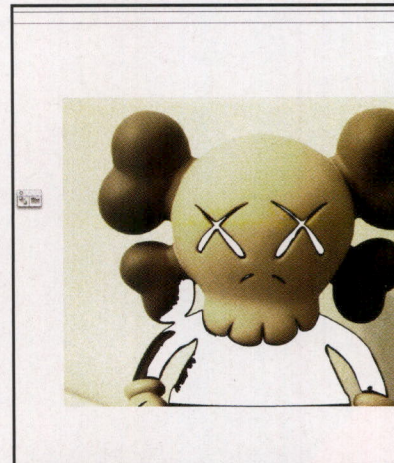
<http://juniatwork.mrtio.com/>



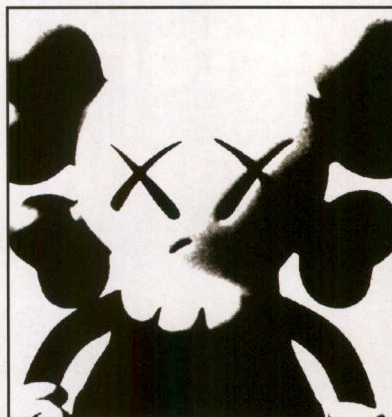
1 In order to trace a photograph, you need an image to begin with. Avoid copyright complications by scanning your own photos or using a digital camera and prepare them in *Photoshop* or another image editing application. Images with good contrast and sharp outlines generally make good candidates.



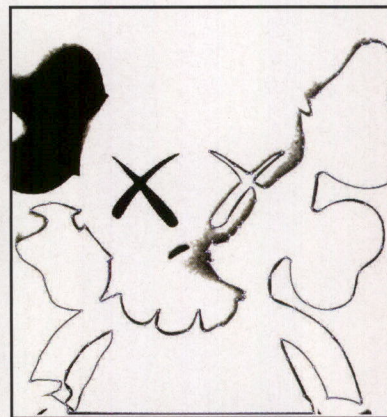
2 Create a new document in *Illustrator* (File>New...) and import your photograph (File>Place...). Resize the image by dragging the resize handles until you're comfortable. You can also use the image mouse.tif provided on the cover CD.



3 Use the Auto Trace tool, which can usually be found lurking behind the Blend tool on the toolbar, and start clicking on the photograph. You'll notice that *Illustrator* creates shapes based on areas of similar tone using the current stroke and fill values.



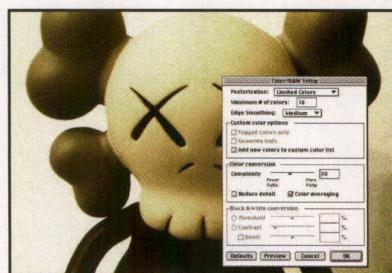
4 *Illustrator's* built-in Auto Trace tool is not very precise, and our first attempt was not very good. Open your photograph in *Photoshop* or other image editing application and increase the contrast and re-import it into *Illustrator*. You can also use the image mouse2.tif provided on the cover CD.



5 Using the Auto Trace tool is now more successful and clicking on the dark areas produces more recognisable shapes. As each area must be clicked on individually to trace it, background elements can be ignored to focus on the foreground image.



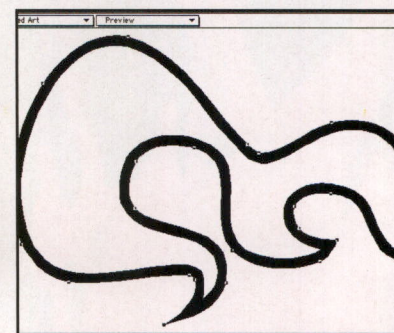
6 Although coarse, the final result is pretty good. The advantages of vectors are apparent when it comes to applying fills and strokes to the image as this preview shows with the photograph layer turned off.



7 A more accurate and controllable way of converting raster images to vectors automatically is to use *Adobe Streamline*. Open your photograph in *Streamline* (File>Open...) and experiment with the Colour/B&W Setup (Options>Colour/B&W Setup) which controls how *Streamline* handles colour and tone.



8 Convert the image to vectors (File>Convert) and *Streamline* does a much better job of interpreting the original artwork than *Illustrator* can. The more colours you choose, the more complex the final paths are, so experiment to find the best combinations that work well for your images.



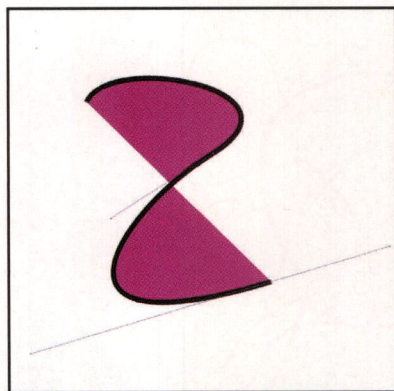
9 *Streamline* is ideal for converting black and white bitmaps, such as logos, to vector paths. The larger and clearer the source image, the better the final Streamlined image will be.

Part 2: Doing it the hard way

The computer can't do it all, so when you need the über-cool hand-traced feel to your artwork, it's time to break out the Pen tool...

Making the most of Streamline

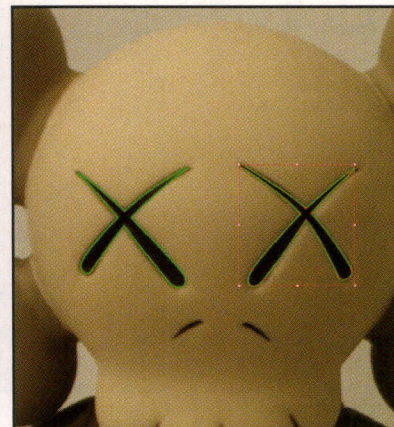
Adobe *Streamline* is a dedicated application that traces raster images and converts them into vector paths. The last version of *Streamline* was version 4 released back in 1997 and frustratingly Adobe hasn't upgraded it since. This means no multiple undos, an antiquated interface and no Mac OS X version. It is, however, a valuable part of any designer's toolkit and the secret of success is in the preparation of the bitmap images prior to streamlining: in the bitmap editor of your choice, rotate the image if necessary to straighten lines, clean up stray noise and ensure that areas of flat colour are uniform. The better the quality going into *Streamline*, the better the quality that comes out.



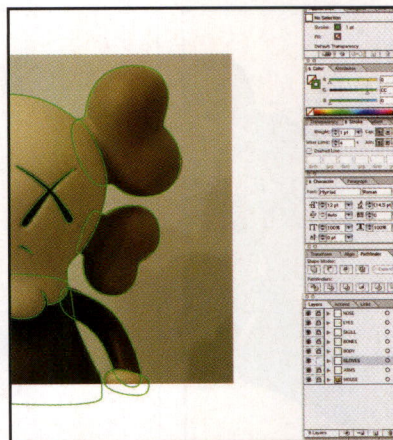
1 Sometimes there's no alternative but to roll up your sleeves and do the job manually. If the hand-traced look is what you're after, then you'll have to get used to handling Bézier curves, *Illustrator's* method of controlling paths created with the Pen tool. Although counter-intuitive at first, with practice they become easy to use.



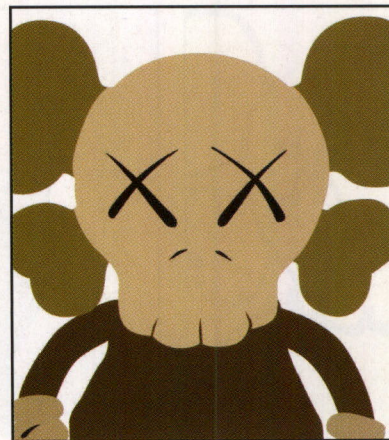
2 As before, place your image (File>Place...) into a new document (File>New...). Making sure that you use a coloured stroke that will contrast with your background and no fill, begin to use the Pen tool from the tools window, remembering that fewer control points are better.



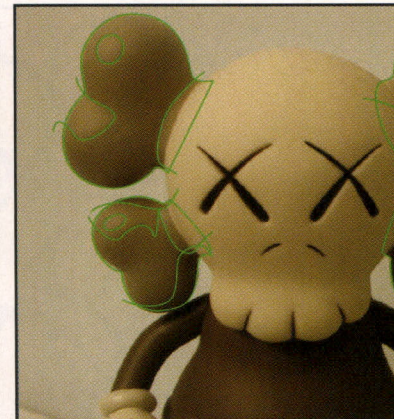
3 Where areas overlap, you can combine the shapes into a single unit using the Pathfinder floating window. Select the Add to Shape Area icon from the Shapes mode section. By not expanding, the individual shapes remain editable.



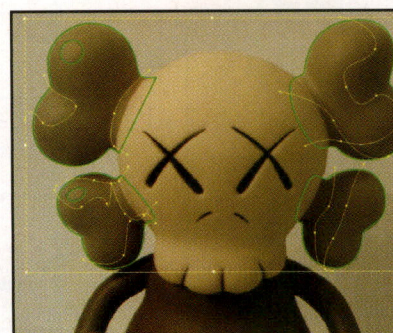
4 Create new layers for each major element, in this case separate layers for the arms, body, eyes and so on. Keep the layers ordered so that objects at the front of the image remain on the highest layer.



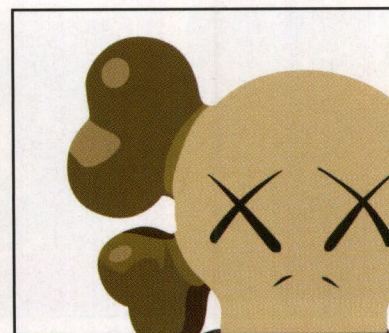
5 Time for a quick render: fill the paths with colour to see how the artwork is progressing. A good tip is to select a path, use the Eyedropper tool and by pressing the Shift key as you click you can sample colours from the photograph.



6 The quick render showed us that we are on target, but the image was a little flat. Add some shadows and highlights by marking out areas with the Pen tool where the lighter and darker areas of the image meet. With a soft gradient, it can take some practice to get the path in the right place.



7 You can use your new paths to slice up the old paths by making sure that the new intersecting paths have no stroke or fill and using the Divide icon from the Pathfinder floating window.



8 Do another test render by filling the new areas with colour and you'll see that the highlights and shadows are working and are giving the artwork some depth.



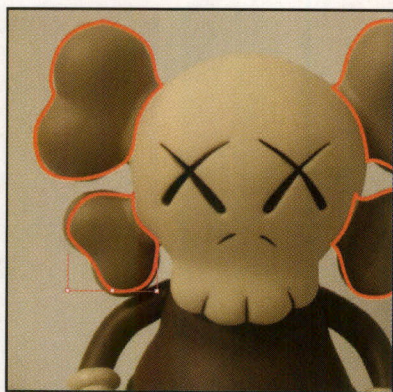
9 Continue to add shadow and highlight detail to the rest of the image and, by carefully choosing the colours, you should end up with an image which looks cell shaded. >

Part 3: Other effects

Here are some additional techniques and applications that will enable you to get the most out your traced photograph...

Preparing your images

When tracing images automatically or by hand using the Pen tool, preparing your images beforehand in *Photoshop* or other image editing application is a good idea. Remove unwanted background details and noise, and add more contrast to bring out details. Posterising the image by bringing the black and white triangles closer together in Levels (Image>Adjustments>Levels...) or using some of *Photoshop*'s built-in filters such as Median (Filter>Noise>Median...) can make interesting starting points for tracing your images.



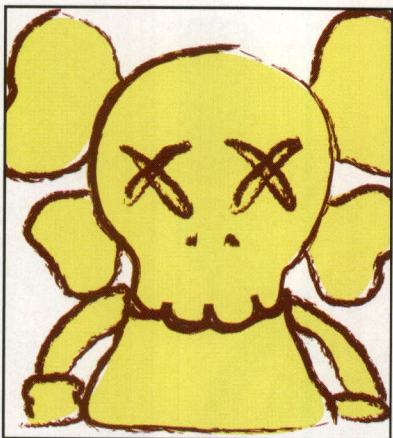
1 There are other ways to transform your photographic image to vectors by tracing. For the most hand-drawn look of all, use the Paintbrush tool, which creates fairly smooth curves with few control points from freehand painting on the screen. A drawing tablet is best, but acceptable results can be obtained with a mouse.



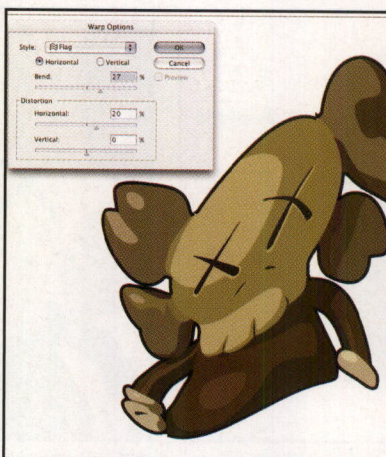
2 Having drawn the paths, the background photograph layer can be hidden to reveal your masterpiece. Paths are difficult – if not impossible – to join up using the Paintbrush tool, so filling the paths with colour might not be the best option.



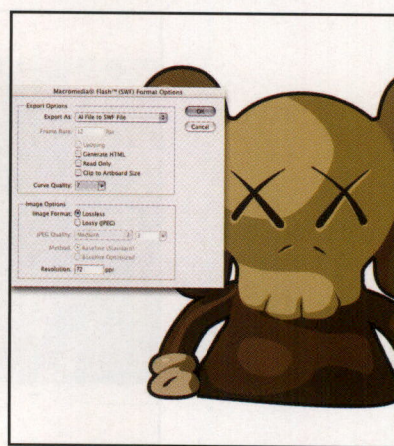
3 To preserve the hand-drawn look, create loose fills on a separate layer that overlap and spread beyond the paths.



4 The beauty of *Illustrator* artwork is the ease with which it can be modified to create a completely new look. Experiment with different brush and path settings such as the Charcoal brush, which gives a chalky feel to the artwork.



5 The artwork can be modified in many other ways, such as applying distortions (Effect>Warp). Group the image first, however, to avoid unexpected results.



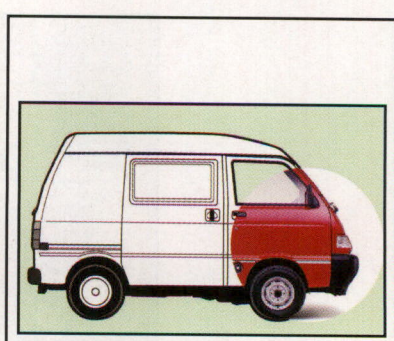
6 Now that your image is in vector format, there are new and interesting options available to you, such as exporting to .swf format (File>Export...) for Web use and importing into Macromedia *Flash*.



7 Vectors can be pasted into an open *Photoshop* document or placed (File>Place...). The vectors can be scaled, rotated or distorted before final rendering, keeping the image sharp whatever the document resolution.



8 Once in *Photoshop*, the full range of *Photoshop*'s tools and layer effects are at your disposal. You have the best of both worlds: the flexibility of paint tools and the resolution independent sharpness of vectors.



9 Having mastered the fundamentals of tracing photographs in *Illustrator* you'll find countless applications for the technique, from funky flyers to technical illustrations.

Part 4: Experimenting with strokes and fills

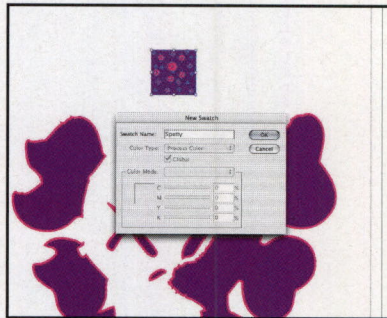
There are limitless ways you can create and use traced photographs in *Photoshop*, *Streamline* and *Illustrator*. From the same source material you can create many different styles and illustration techniques...

Vector pixellation

You can use *Illustrator* to create pixellated versions of your photographs and images. Each pixel is a vector rectangle and can be manipulated in *Illustrator* just like any other vector shape, leading to some interesting experiments. Create a new document and place a photograph or other image on the page (File>Place...). With the image selected apply the Object Mosaic filter (Filter>Create>Object Mosaic...) and you'll be presented with a dialog box with several options for creating the mosaic tiles, such as Tile Spacing, Number of Tiles and Constrain Ratio. Applying the filter makes a new vector copy of the image so the original is left untouched.



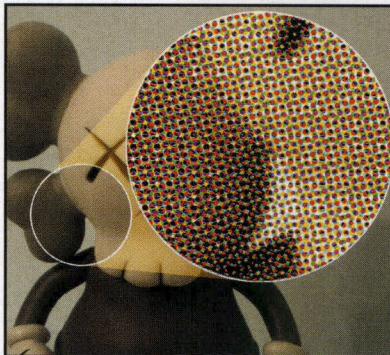
1 Because traced photographs are made up of strokes and fills, it's possible to experiment with unusual fills for creative effect. Start off by using one of the traced images from the earlier steps and give it a 3pt stroke from the Stroke floating palette.



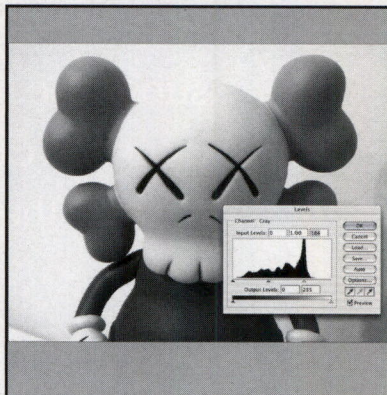
2 Using the Rectangle tool from the Tools palette draw a square (using Shift to constrain the proportions). Using the Oval tool draw random circles over the top of the square making sure the circles don't stray over the edge. Turn this pattern into a new fill swatch by selecting the background square and the circles, selecting Edit>Define Pattern... and giving it a unique name.



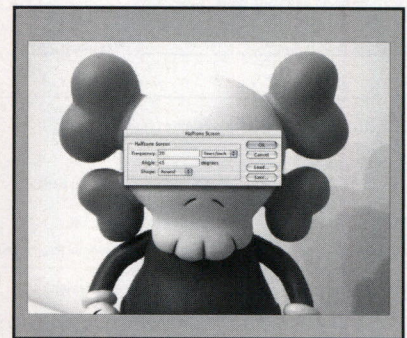
3 The new pattern fill will appear in the Swatches floating palette. Simply select the pattern for the traced photograph's fill as you would any other colour. You can experiment with transforming the fill by selecting the filled object, choosing a transformation tool, holding down the tilde key (~) and dragging.



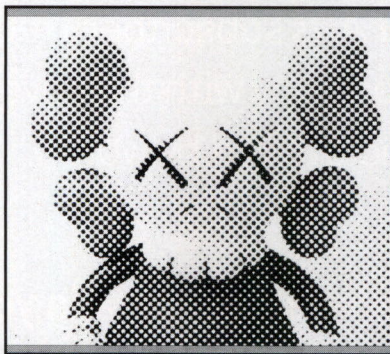
4 An interesting way of producing vectors from your photographs is to use the halftone screen functions in *Photoshop* which mimic the patterns that imagesetters use to create the appearance of continuous tone on a printing press. If you look at a magazine or book very closely, you'll see that the colour images are made up of tiny spots of cyan, magenta, yellow and black ink called halftone dots.



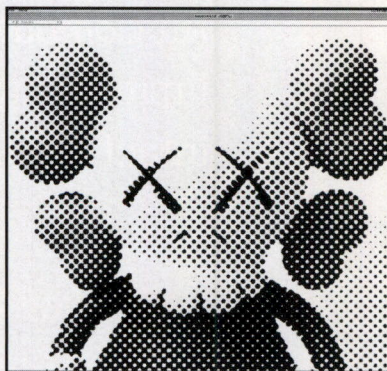
5 Open mouse3.tif (from the cover CD) and convert it to greyscale (Image>Mode>Greyscale). Adjust the levels (Image>Adjustments>Levels...). Adjust the white and black triangles closer together to create a more contrasty image that has pools of pure white and black.



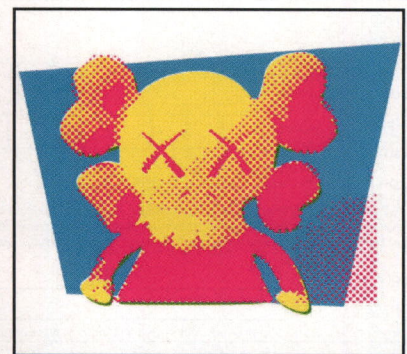
6 Convert the greyscale image to bitmap (Image>Mode>Bitmap...). From the dialog box that appears select a resolution double that of the input value and Halftone Screen... from the Method drop-down menu. In the subsequent Halftone Screen dialog box choose a coarse frequency such as 20 lines/inch, an angle of 45 degrees and select Round from the Shape drop-down menu. Then press OK.



7 The result should be a version of the photograph with a strong halftone screen applied. You can experiment with different types of screen such as line or diamond, which give very different effects. Save the file as a TIFF ready to be opened in *Streamline*.



8 Open the halftone TIFF in *Streamline* and by simply using the default settings convert the photograph to vectors (File>Convert). Save the file as an *Illustrator* file or EPS (File>Save Art As...) so that it can be opened in *Illustrator*.



9 You can now manipulate the vector halftones in *Illustrator*. In this case we've extended the halftone theme and roughly applied cyan and yellow shapes behind the halftones, which have been coloured magenta to give the impression of a coarsely printed image. **CA++**

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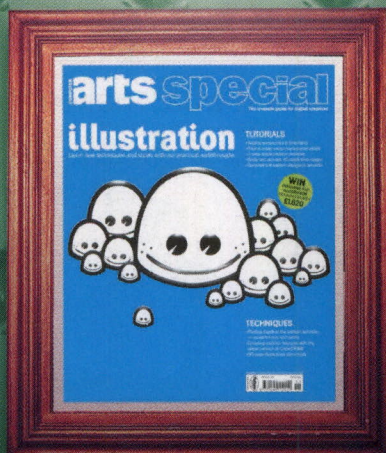
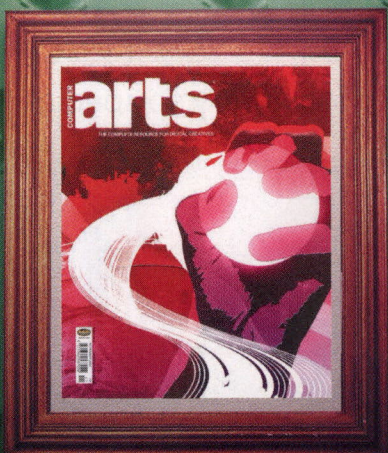
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10 free lomo pictures

The people at Lomo World Archive explain what makes their photo library so special...



The Lomographic World Archive at [w] www.lomography.com/lwa has long been the most coveted of secret places for discerning graphic designers all over the world. With over 32,000 images (and more being added daily) every visitor is guaranteed an experience of unparalleled pictorial revelry — it's the most comprehensive archive of snapshots of all time, with all the wackiest and most impossible sights and moments of our age.

Delicacies can be found here which are foreign to other, more conventional photographic archives. Whether you're looking for street scenes in Ingushetia, pictograms from Tokyo, the dog that lives around the corner (with and without its owner), or even two lovers late at night in a New York bar, the Lomographic World Archive is a breathtaking voyage of discovery. It's an immersive world of previously concealed everyday situations, glances behind the scenes of the human

existence... in essence, an unadulterated visual feast.

And what's the best thing about it? Even though all the photographs are snapshots taken by the unmanicured hands of hundreds of Lomographers around the planet, most of them are available in high resolution copyright- and model-released versions for all kinds of projects, regardless of how crazy or off-the-wall they might be, non-profit or commercial. So anyone who finds images they want to use in

this online archive can probably get the rights to them too. A flexible LWA crew is at your disposal pretty well around the clock at images@lomography.com. And don't forget that there are so-called 'Lomographic Embassies' in almost every country waiting to whip out their cameras on commissioned shoots.

There is an excellent little compilation of Lomographic images on the *Computer Arts Special* cover CD this month. These can be used freely for any non-commercial purposes. **ca-s**



Win [Ten Lomo Supersamplers]

Enter and you could win one of ten Lomo Supersampler cameras...

We've teamed up with the Lomo World Archive to offer ten *Computer Arts Special* readers the opportunity to win a Lomo Supersampler camera.

Lomography first came about in the early 1990s when a couple of students discovered a small, enigmatic Russian camera, the Lomo Kompakt Automat. A new style of artistic experimental photography was created with their first unorthodox snapshot cavortings.

What started out spontaneously as an artistic approach to photography in the Vienna underground scene developed into a far-reaching, international socio-cultural movement. The intuitive approach is to take as many photographs (or Lomographs) as possible in the most impossible situations and from the most unusual positions possible. The Lomographs are then developed as cheaply as possible. The result is a flood of authentic, colourful, crazy, unfamiliar and often brilliant snapshots.

What the camera can do

The Queen of all multi-lensed cameras. Four highly light-sensitive and high precision Japanese panoramic lenses capture four precisely positioned sequential panoramic shots on a single photo. Normal film, normal processing, no batteries.

Questions

Where did the lomo style originate?

To enter

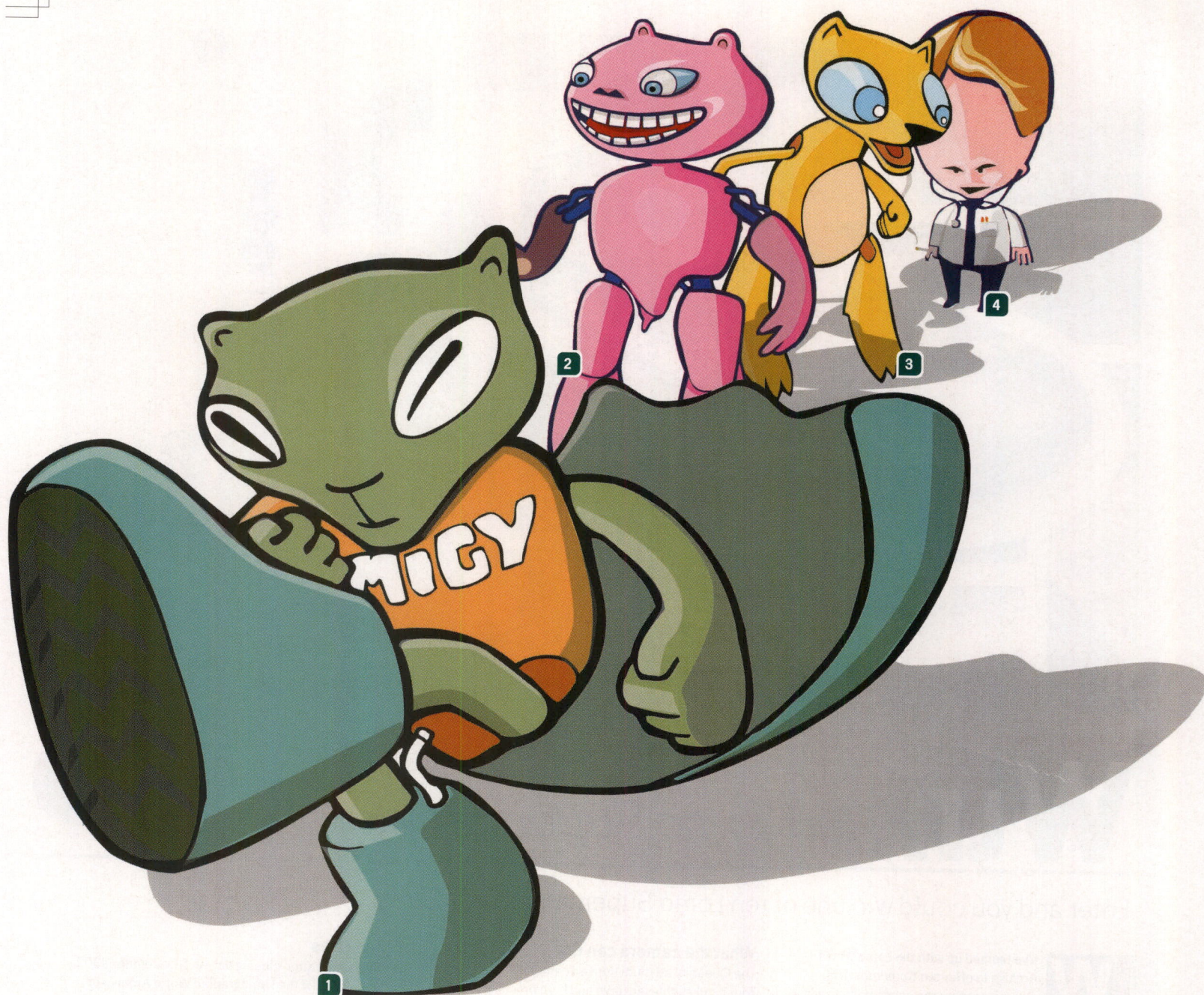
The easiest way to enter is via our Website at [w] www.computerarts.co.uk/competitions. Or click the Competition tag on the Contents screen of our cover CD, then enter *Lomo* as the competition name, and fill in the rest of the form. Click Submit Entry. If you don't have Web access, you can send your answer on a postcard, along with your address and a contact number to: *Lomo Competition, Computer Arts Special*, 30 Monmouth Street, Bath, BA1 2BW.

The rules

The competition closing date is 5 December 2002. Employees of the Lomographic World Archive or Future Publishing, or any of their agents or families, may not enter. Multiple entries will not be accepted. The editor's decision is final. There are no cash alternatives. No other correspondence will be entered into. If you are entering by post and do not wish any of the companies involved in this competition to contact you with further offers, indicate this on your entry. We won't pass details on to third parties. **ca-s**



For information about becoming a member of the Lomographic Society International and for details of all of its products, visit [w] www.lomography.com. The Lomo World Archive can be viewed at [w] www.lomography.com/lwa.



1. A render of Migy in action, developed from a series of sketches done for the Migy character to see how he could animate. Created with Adobe *Streamline 4* and Adobe *Illustrator*.

2. This is the smile to end all smiles. Developed from a sketch then vectorised, and cleaned up in *Illustrator*. Mr Teethhead was created for Mig's Website and the Migy cartoon.

3. This is Mig's latest character. It's again been developed from a sketch then vectorised, and cleaned up in *Illustrator*. Tiggs was created for migy.com and the Migy cartoon.

4. Dr Blanco is the evil doctor who will try to destroy the world (unless Migy can stop him). "He started life as a very crude pencil drawing that I later scanned; I then rebuilt him in Macromedia *Fireworks*," says Mig. He is used on the homepage of migy.com, where he walks on to the page and smokes a cigarette. All the animation frames were also built in *Fireworks* then imported into *Flash* to create the finished sequence.

5. The Migy character started it all. "He was created for my Website, hand-drawn then vectorised using Adobe *Streamline 4*, cleaned up and coloured in Adobe *Illustrator*," says Mig. "I have plans for this fellow in the form of a short animation."

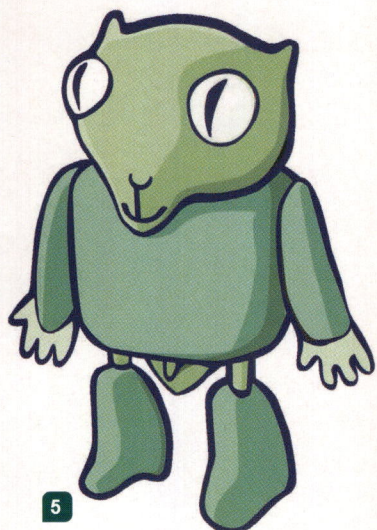
6. "Jimmy Pill's drugged-up look was developed from a sketch then vectorised, and cleaned up in *Illustrator*," says Mig. He is another character created for the Migy cartoon and Website.

7. This character was built in Macromedia *Fireworks*, and is used as the Home button on the Migy Website.

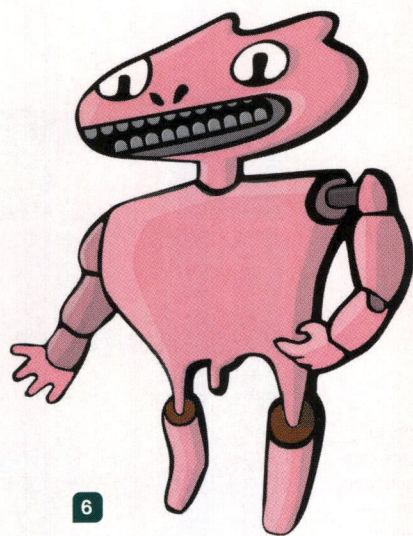
8. Originally a symmetrical sketch drawn for the purpose of creating a pix character, he was rebuilt in Macromedia *Fireworks*. He is used as the email button on the Migy site.

9. "Painted from my imagination, this uses some very odd perspectives," says Mig. "It's painted on canvas using acrylics and a bit of gloss to add texture."

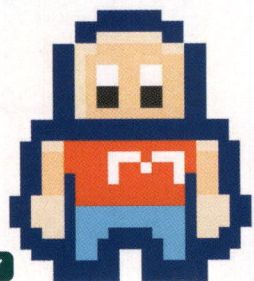
10. "This painting was built up from many sketches done while sitting in Manchester, then painted on canvas using acrylics and a bit of gloss to add texture," says Mig.



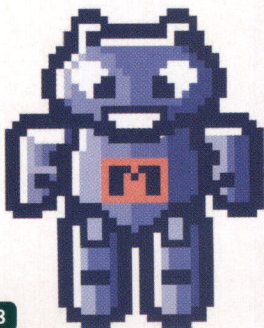
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Mig

"The most useful tool I use is still the pencil," says illustrator/designer/animator Mig about the creation of his animated characters...

Playing around with Deluxe Paint on his Amiga 500 as a wee nipper was where it all started for Miguel Ornia-Blanco, or Mig as he prefers to be known.

Mig is a full-time painter based in Tufnell Park, London, and it's a skill that he developed at university. "I would sometimes find myself on the streets of Manchester madly drawing people, cars and buildings as they sped around the city," he says. After completing a three-year Fine Art Painting course in Hull, he embarked upon a post-graduate course in 3D, Animation and Programming at the University of Teeside.

After hours, Mig works on his animation and character design, but he does find that he has to juggle this work with his full-time job. "I do carry my laptop and two sketchbooks around with me, so I can always slip in some of my own work during the day. I quite often find myself in meetings sketching or doodling characters into my sketchbook," he admits.

Mig's characters are very pixelated, with an innocent but edgy look about them. "I think my characters have a kind of cute-evil look that seems to combine well," he says. The main character, Migy, was originally created for Mig's Website. He started off as a hand-drawn character and was then vectorised in Adobe *Streamline 4*, cleaned up and coloured using *Illustrator*.

Mig's style stems from his personal preferences. "I'm quite into the pixel style that's around a lot on the Web," he says. "I also really like old-style videogame graphics such as those used in Nintendo's *Zelda*. Nintendo are masters!"

Although the pixelated look features greatly in his

work, Mig doesn't try to stick to one uniform style. "Technically, my style has adapted and changed depending on whether I am painting or working as an illustrator," says Mig. "I do try to take chances and I'm willing to break my own rules, otherwise the work starts to look a bit stale."

Fireworks is Mig's tool of choice for creating his little pixel buddies, and he also favours *Flash*, *Photoshop* and *Illustrator*. However, one tool that many artists dismiss is Mig's overall favourite: the pencil. "You cannot beat it for getting ideas down fast," he enthuses. All of Mig's work starts out as a sketch: "My sketches are where my style comes from. With sketches I can develop an idea easily into a painting, as I could into a pixel style for the Web."

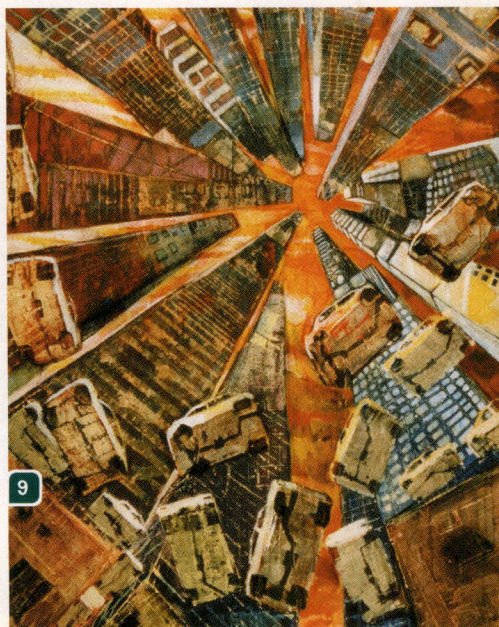
Along with his software is his pride and joy — his Dell Inspiron laptop: "It's a 1GHz PIII, with its big 64MB 3D graphics card and half a gig of RAM... oh, not forgetting its 15-inch high-res screen. Nice!"

Mig's inspiration mainly comes from his doodles. "Sometimes I go back to a doodle I did a few weeks before and render it up into something interesting," he says. But he also likes to use Google's image search to find odd images and develop those.

The next step for Mig is to branch out and create a short animation using his characters, as well as actively seeking interesting commercial animation and illustration work. But if he wasn't an illustrator/designer/animator, Mig believes he would be something different: "I'd be a very, very famous painter, or a gigolo!" **cas**



You can see some of Mig's most recent work on his Website at [\[w\] www.migy.com](http://www.migy.com).



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Creating textures in CorelDRAW 11

CorelDRAW's old and new interactive tools make the job of creating textures much easier...

CorelDRAW's powerful set of interactive tools was introduced in version 7 and has been refined in subsequent versions of the application. The appeal of these tools is the ability to edit and apply effects to objects on screen and in real time as opposed to the user dialogue menus common to Adobe *Illustrator* and Macromedia *FreeHand*. While the original concept of

the context-sensitive Property Bar menu and interactive tool interface was inspired by Xara's *Xara 1.0*, Corel has improved upon many of these tools and features and pioneered a few of its own. In the following tutorial, we'll see these interactive tools in action as we create various textures.

So that we are all reading from the same page, open Page Options (Layout>Page Setup), change the page

size to Letter and change your Units to Pixels. We chose pixels because they are a standard unit of measurement common to all countries. Set your Nudge amount to 1 pixel (View>Grid and Ruler setup). We will be working in DRAW's default CMYK colour space. Deselect Treat as Filled; but if you are an *Illustrator* user, you may prefer to leave the setting as it is. The icon for this is on the Property Bar at the top of the screen. >



Expertise provided by Gary W. Priester. Gary contributes to Corel's Website [w] www.designer.com and has a large collection of articles called Logos for the Design Challenged on Unleash.com. Gary also writes graphics software reviews for Communication Arts Magazine, USA. He created and maintains the XaraXone, [w] www.xaraxone.com, a Website devoted to all things related to Xara X. E-mail Gary at [e] gary@gwpriester.com



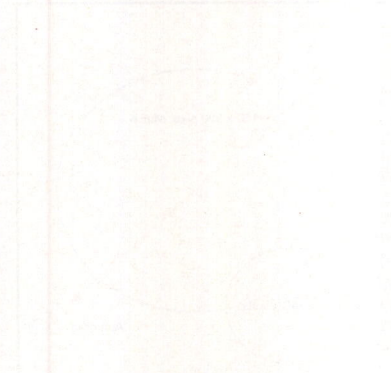
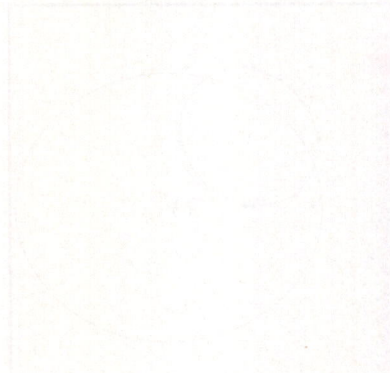
Files on disc

The screenshots displayed throughout this tutorial can be found in the Tutorial\Draw folder on the cover CD.

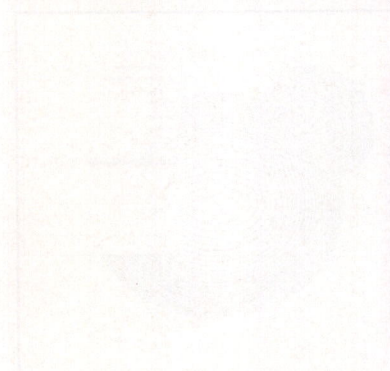


Part 1: Creating the wireframe

For drawing, we use CorelDRAW's Ellipse tool to create an outline of the bear's head and ears. We then use the Bézier tool to create a series of connected lines to create a wireframe structure.



Creating a wireframe structure for a bear's head and ears is a complex task. It involves using the Ellipse tool to create the basic outline and the Bézier tool to create the internal structure. The wireframe is then used to create the final texture.



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Part 1: Creating the wireframe

For openers, we use *CorelDRAW*'s Ellipse tool to create an outline of the bear's head and ears. We then use the Contour tool to create a set of contour rings to create a wireframe armature...

Floating menus

Most of the menus shown in this article will be in the floating, instead of the docked, position. This is done to make it easier to identify the menus.

Centre of rotation

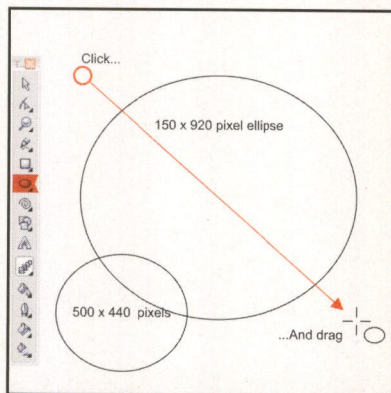
When you enable Rotate/Skew mode, a repositionable bull's-eye appears in the centre of the object. You can drag this bull's-eye to change the centre of rotation for an object or selection of objects.

Flop and drop

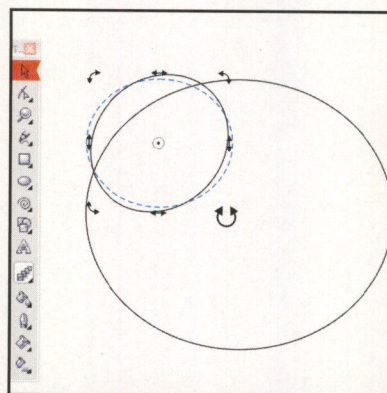
Windows users can flop and drop a duplicate by pressing the right mouse button before releasing the left after the shape has appeared on the right. You can drag and right-click to drop a duplicate as well.

Interactive interface

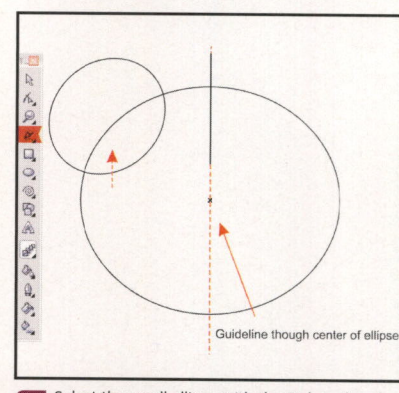
The dashed line with the arrowhead and two boxes is the Contour tool interactive control. Moving the slider rectangle increases or decreases the number of contour rings.



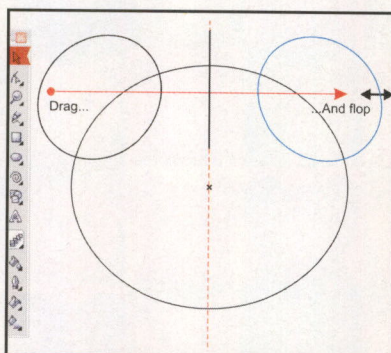
1 Using the Ellipse tool (highlighted in red) draw two ellipses to the size shown. The size doesn't have to be exact. You can enter the Height and Width dimensions in the Object Size text entry boxes on the Property Bar at the top of the screen.



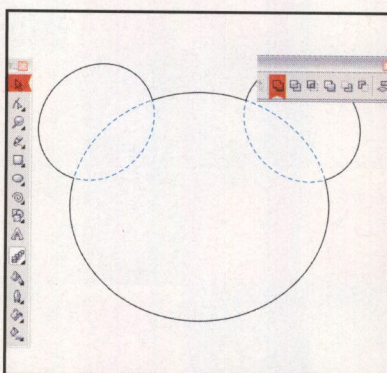
2 Click twice on the ellipse to enable Rotate/Skew mode. Drag one of the rounded corner rotation handles until the rotation amount on the Property Bar shows 45 degrees. (You can also key in 45 and press Enter.)



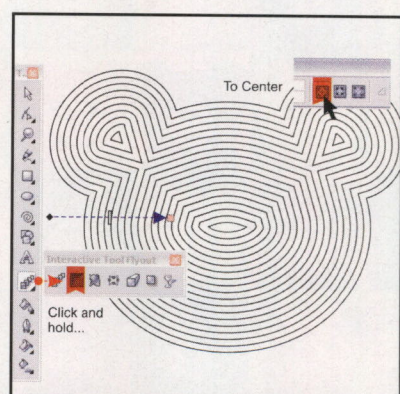
3 Select the small ellipse with the Pick tool and drag it upwards as shown. Drag a guideline from through the centre of the large ellipse. Enable Snap To Guidelines (View menu). Using the Freehand tool (highlighted in red) draw a vertical line about the height of the small ellipse.



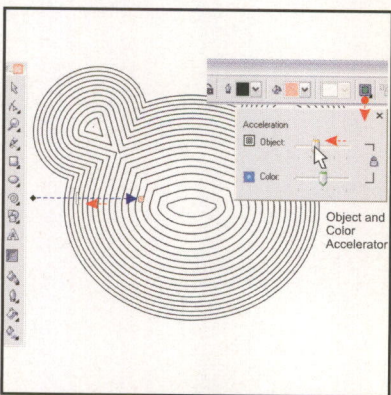
4 Click the small ellipse and press the + key to create a duplicate. Hold down the Shift key and click on the vertical line to multiple-select both objects. Holding down the Ctrl key, drag the left centre bounding box handle to the right and past the vertical line. The ellipse will now flop over to the right.



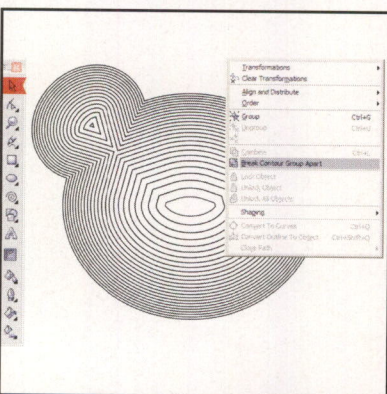
5 Make duplicates of the three ellipse and set them to one side. We will need them later on. Select all three ellipses. On the Property Bar, press the Weld icon (highlighted top right). This combines all three shapes into one continuous outline. (The blue dashed line represents the original ellipses.)



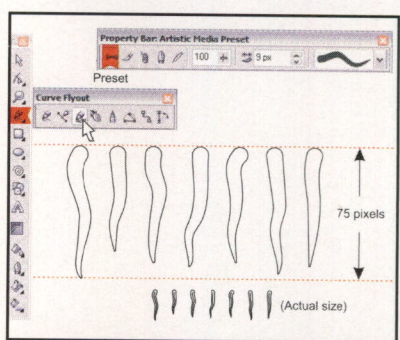
6 Select the combined outline shape. Press and hold the Interactive Tool button until the Flyout menu appears. Next, you need to select the Contour tool (highlighted in red). On the Property Bar, press the To Centre icon.



7 Change the number of contour steps on the Property Bar to 24. Change the Offset to 18. Press the green icon on the Property Bar to open the Object and Colour Accelerator dialog. Move the top slider a little bit to the left.



8 Contours are 'live' effects. They remain editable until they are broken apart. Select the contour and from the Arrange menu, select Break Contour Group Apart. Select the Arrange menu again and select Ungroup All.



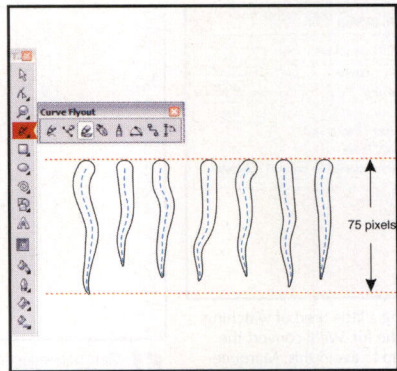
9 The strokes need to be around 75 pixels tall. Draw a rectangle that is 75 pixels tall for reference and zoom in close. Open the Curve Flyout and select the Artistic Media tool. Click the Preset icon (highlighted on the top in red). Set the size to 9px and select the first preset stroke shape from the drop-down list. Draw a series of wavy lines like those shown here.

Part 2: Adding the fur

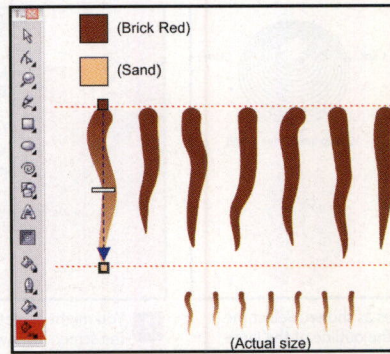
The individual fibres are added to a Spraylist to create fur. We modify the spacing of the fur fibres and save these settings to get the spacing just right when we add the fur to the contour wireframe...

Identifying colours

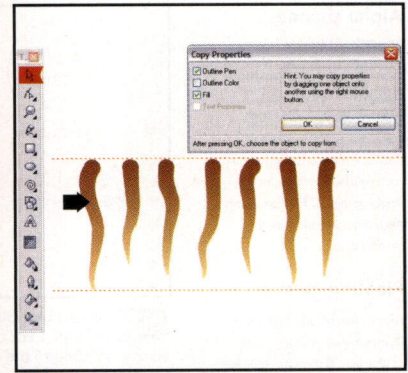
Colour names appear in a tool tip when you let the cursor rest over a colour on the screen palette for a few moments. The same holds true for all buttons and icons...



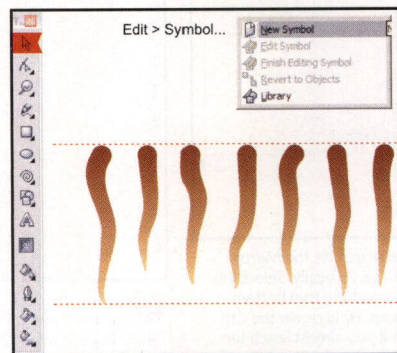
- 1 When you're happy with your strokes, marquee-select the stroked shapes and, from the Arrange menu, select Break Objects Selected Apart. A line will appear in the centre of each stroke shape. Select these lines and delete them leaving only the stroke outline.



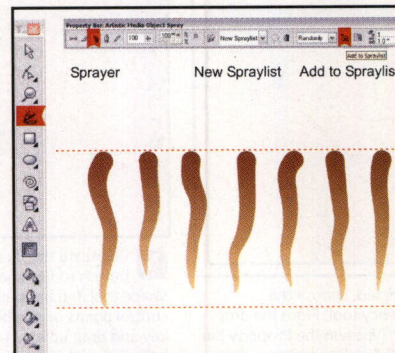
- 2 Select the line shapes and apply a Brick Red fill by clicking the Brick Red swatch on the screen palette. Select the interactive Fill tool (highlighted in red). Drag from the top of the first stroke to the bottom to add an interactive linear gradient fill. Click the bottom box on the fill path then click the Sand colour.



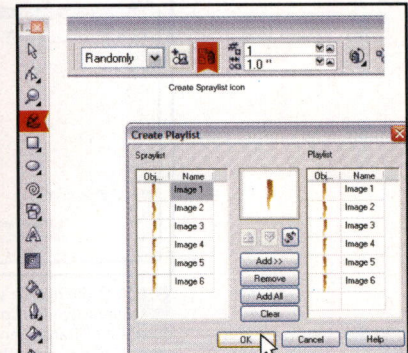
- 3 Select the Artistic Media tool. On the Property Bar, select the Create Spraylist icon. The images you added to the Spraylist will appear both on the left and right sides. The images on the right are the images we will 'spray' onto the contour lines.



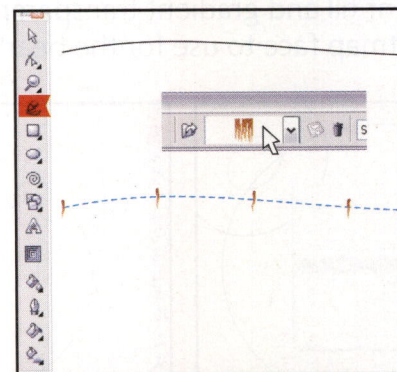
- 4 Select the first stroke shape. From the Edit menu, select Symbol. In the Flyout menu, select New Symbol. Repeat this step individually for the other stroke shapes. Symbols are new in DRAW 11 and allow objects that are to be used multiple times in a drawing to only be defined once resulting in smaller file sizes.



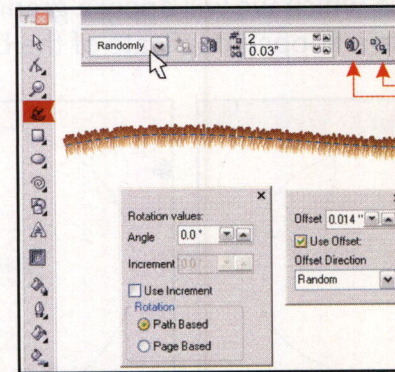
- 5 Select the Artistic Media tool, then select the Sprayer icon. In the drop-down list of sprayer images, select New Spraylist. One by one, select each stroke shape with the Artist Media brush cursor then click the Add to Spraylist icon. Repeat and add all strokes to the Spraylist.



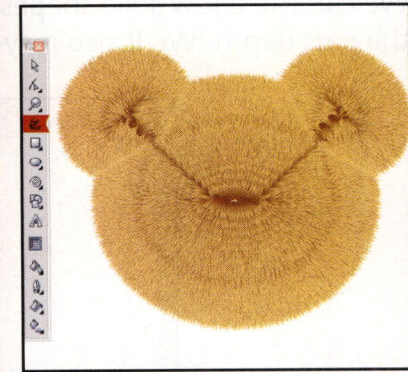
- 6 Select the combined outline shape. Press and hold the Interactive tool button until the Flyout menu appears. Select the Contour tool (highlighted in red). On the Property Bar, press the To Centre icon.



- 7 Using the Freehand tool (or any of the other line creation tools) draw a simple wavy line. Select the Artistic Media tool. Select the Sprayer icon on the Property Bar and then select the representation of the multiple strokes on the Spraylist File List drop-down list.



- 8 With the sprayed line and the Artistic Media tool selected, select Randomly from the drop-down list. Change the Data Spacing to 2 and 0.03". Click the Rotation icon and check Path Based and press Enter. In the Offset dialog, check Use Offset and Random and press Enter.



- 9 Select the modified strokes with the Artist Media tool. From the list of strokes select New Spraylist. Then press the Add to Spraylist icon. Select the contour lines then select the Artistic Media tool. Select the new fur spray we just created from the Spraylist drop-down. Instant plush! ➤

Part 3: Making the muzzle

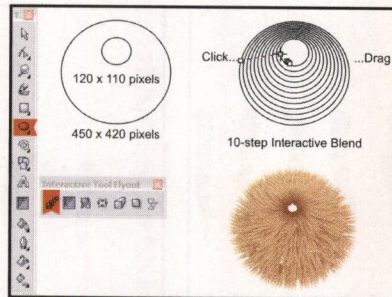
We now create a blend of two ellipses for the bear's muzzle and add fur. To cut down the redraw time, we convert the face, ears and muzzle to bitmap using *DRAW*'s powerful bitmap creation and editing tools...

Alpha channel transparency

When you select the Transparent Background option, Corel creates a bitmap image with alpha channel transparency providing there is no background rectangle behind the selection. Applying the ICC Profile ensures the bitmap will match your monitor display.

Floating menus

You can tear off and float any of Corel's menus by dragging the double bars at the top or left side of the menu onto the screen. You can resize the menus in height and width as desired. To return a menu to its original docked position, simply double-click on the title bar.



1 Construct two ellipses as shown. Select the Blend tool. Click on the outline of the large ellipse and drag to the outline of the small ellipse. Change the blend steps to 10. Press Enter. Apply the fur spraylist. You may need to reverse the rotation of the fur.



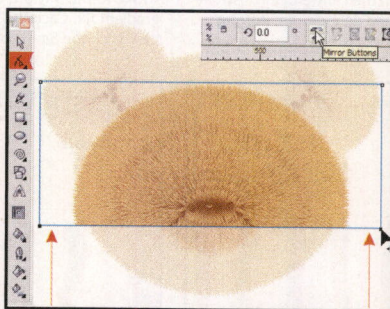
2 You might be getting a little tired of watching the screen redraw the fur. We'll convert the whole fur face to a bitmap to avoid this. Marquee-select all the face fur. From the Bitmaps menu select Convert to Bitmap. Use the settings shown above and press OK.



3 Marquee-select all the elements of the fur-covered blend and convert them to bitmap using the same settings we used previously. Position the bitmap over the face as shown.



4 With the muzzle selected, choose the Interactive Transparency tool. From the drop-down list of Transparency Types on the Property Bar, select Uniform. From the list of Operations, select Divide. Move the slider to 50%.



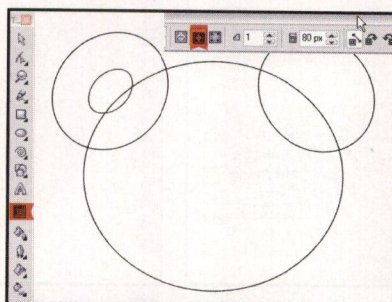
5 Duplicate the face bitmap. Use the Mirror button to flop the shape vertically. Select the Shape tool and marquee-select the two bottom control points on the bitmap. Hold down the Ctrl key and drag upwards until you almost reach the halfway point. From the Bitmaps menu, select Crop Bitmap.



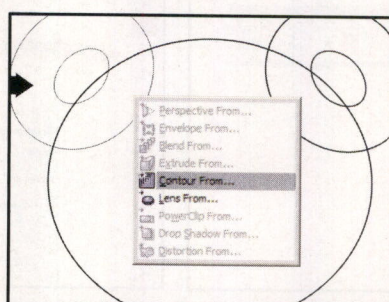
6 Centre the duplicated, cropped bitmap over the head and then send it to the back (Shift+Page Down). This completes the head and body of the bear. Be sure to save your work often and take frequent eye breaks.

Part 4: Applying gradient fill

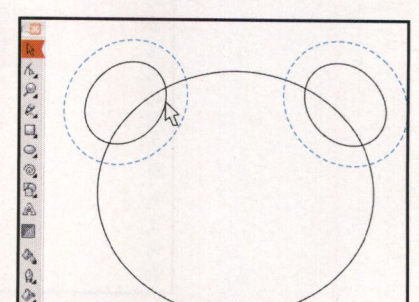
We can use a few solid shapes to which we will apply a gradient fill and gradient transparency to give the ears depth. We'll also recycle a flopped duplicate of the bitmap face to use for the bear's torso...



1 Find the three ellipses you set aside early in the tutorial. Select the interactive Contour tool then click on the left smaller ellipse. Click the Inside icon (highlighted top in red). Change the Steps to 1 and the Offset to 80px. Press Enter.



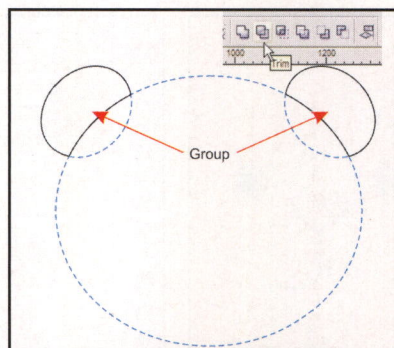
2 Select the right ellipse. From the Effects menu, select Copy Effect... From the Flyout menu, select Contour From... A large black arrow will appear. With this arrow, click the smaller of the two ellipses on the left.



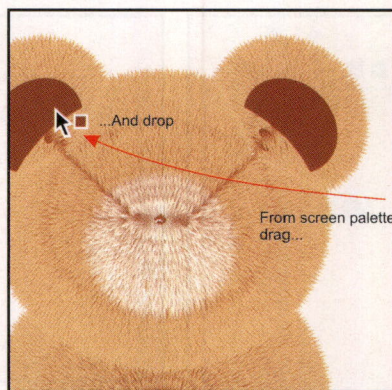
3 Hold down the Shift key and click to select the two inside ellipses. From the Arrange menu, select Break 4 Objects Selected Apart. Delete the two outside ellipses shown in blue outline.

Gaussian Blur

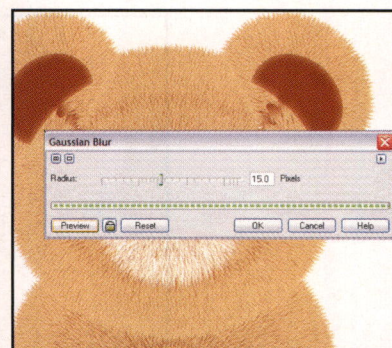
Gaussian Blur only affects the outer edges of a shape. The higher the setting the softer the outline.



4 Group the two small ellipses. Bring the largest ellipse to the top (Shift+Page Up). Select the large ellipse and the group of smaller ellipses and press the Trim button on the Property Bar. Delete all but the grouped, trimmed shapes. Ungroup them (Arrange menu).



5 Here is another way to apply a fill. Drag the Ruby Red colour swatch from the Screen palette and drop it on the left ear. Select the right shape and press Ctrl+R as in repeat.



6 Convert the two brown shapes to bitmap (Bitmaps>Convert to Bitmap). Use the same settings as before: 300 dpi, Transparent Background, ICC Profile. Select each bitmap and from Bitmaps>Blur select Gaussian. Move the slider setting to 15 pixels and press OK.

Part 5: Creating the glass eyes and nose

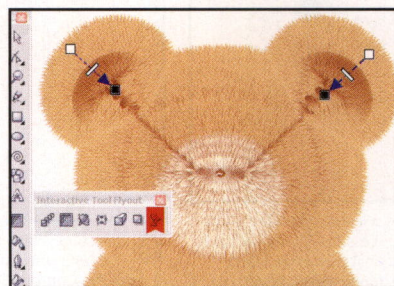
We now use *DRAW*'s interactive Fill and Transparency tools to create some glassy looking eyes complete with subtle highlight reflections. A heart shape will be used to create the nose...

Resizing objects from the centre

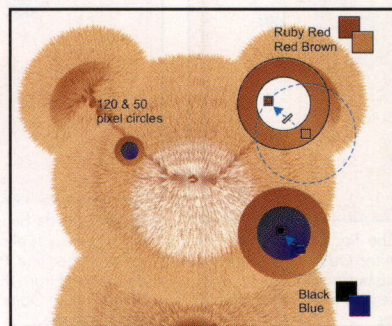
After you create one circle (or object), with the circle (or object) selected, hold down the Shift key. The object will resize from the centre.

Fill colours

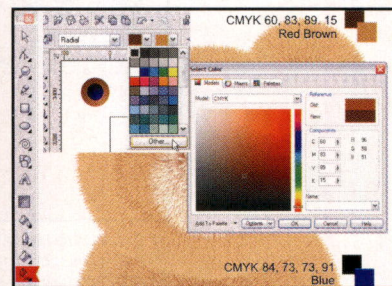
Adding colours to a gradient fill is as easy as dragging and dropping a colour from the screen palette onto the fill path arrow. Colours on the fill path can be edited and moved by dragging their colour station along the fill path. Press the Delete key to delete a colour station.



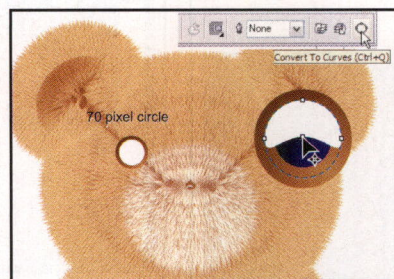
1 Select the Transparency tool (highlighted in red). Click then drag towards the muzzle stopping short of the end of the shape. This is one of several ways of applying an interactive gradient transparency and provides a soft indented portion to the ear. Repeat this for the right ear.



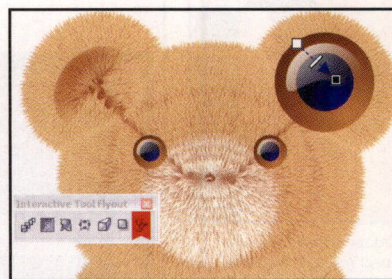
2 Using the Ellipse Tool, and holding down the Ctrl key to constrain the ellipse to a circle, draw two circles, 120 and 50 pixels in diameter. Apply two Radial fills using the colours shown.



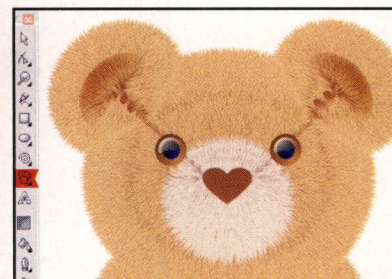
3 Select the brown radial-filled circle with the interactive Fill tool. Click the darker brown button on the Property Bar. Click Other to open the Select Colour dialog. Key in the CMYK values. Select the pupil and change the black to the CMYK values shown.



4 Draw a 70-pixel white-filled circle and centre it over the two other eye circles. Click the Convert To Curves button on the Property Bar. Select the Shape tool (highlighted in red) and drag the bottom control point upwards to the centre of the circle as shown.



5 Select the modified white circle with the Transparency tool. Drag from the top left diagonally down past the bottom of the shape. This creates a highlight and gives the eyes a shiny glass effect. Make a duplicate of the eye and place them on either side of the muzzle.



6 Select the Basic Shapes tool (highlighted in red). From the drop-down list of Perfect Shapes on the Property Bar select the heart icon. Draw a small heart as shown. Apply a Ruby Red fill.

Part 6: The finishing touches

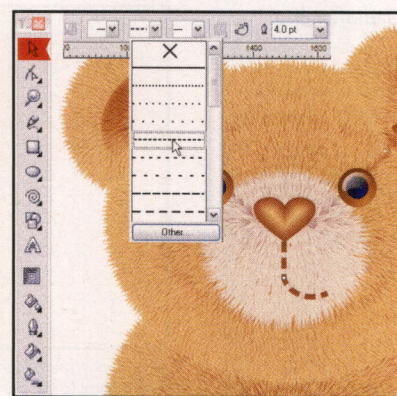
We complete the nose and add a few finishing touches. A gradient-filled rectangle will add a background to the image and we'll also add a bit of a Rembrandt-like lighting quality to the image...



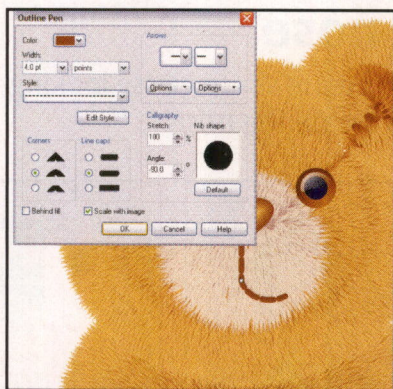
1 Select the heart with the interactive Contour tool. Change the Contour Offset to 2px and click the To Center icon as shown.



2 Using the new three-point Curve tool (highlighted in red) do the following: 1) Click directly under the nose and drag downward, 2) Double-click to continue the line and drag a diagonal line to point, 3) Release the mouse button and drag the curve as shown.



3 Select the line with the Pick tool. Change the line width to 4.0 points. From the Outline Style Selector drop-down list, select the fourth dashed line. Right-click on the Ruby Red swatch on the colour palette to set the outline colour.



4 Select the line with the Pick tool then press the Outline tool to open the Outline Pen dialog. Check the centre two radio buttons for Curves and Line Caps. The dashed line now looks like a string of sausages. Or yarn stitching.



5 With the dashed line selected, press the + key to make a duplicate. Press the Mirror Button to flop the dashed line. Position it as shown. Select both lines and from the Arrange menu, select Convert Line to Object. Then press the Weld icon to make one shape.



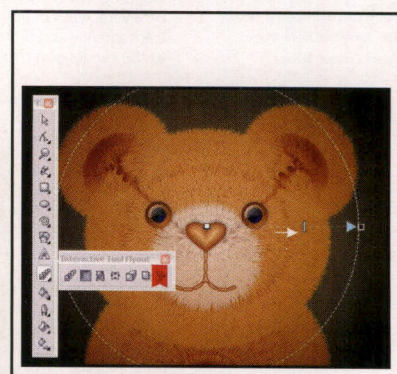
6 Select the shape with the Contour tool. Press the To Center icon on the Property Bar and change the Contour Offset value to 1 pixel. We are just about done now – there remain only one or two finishing touches.



7 We'll use a Glow Shadow to make the eyes, nose, and mouth appear recessed into the fur. Select and group the two eyes and their components. Select the nose and mouth. Select the Shadow tool (highlighted in red). From the list of Preset shadow effects on the Property Bar, select Medium Glow. Add a Radial filled rectangle using a mixed very dark brown, CMYK 65, 82, 94, 27 and Red Brown.



8 Duplicate the background rectangle and bring it to the top (Shift+Page Up). Apply an Interactive, Subtract, Radial transparency.



9 Switch the starting and ending values so the inside is 100% transparent and the outside is 0% transparent. Move the slider a little to the right to accelerate the transparency to the outside. And that's it! A honey of a teddy bear thanks to DRAW's interactive tools. **caas**

COMPUTER arts special BACK ISSUES

The in-depth guide for digital creatives



Computer Arts Special Design brilliant Websites! – COSB0033

In this 100-page guide to Web design, we show you how to design better Websites. Included in this issue: in-depth reviews of *Dreamweaver MX* and *Fireworks MX*; create sites that sell; learn all there is to know about PNG; and 11 brand-new tutorials on lip-synching in *Flash*, setting up a Web server, creating *Flash* components and using *Web Menu Builder*, *Dreamweaver MX* and *GoLive 6*.

CD A full version of *Web Menu Builder* (PC), 1510 *Photo-Objects*, plus demos including *GoLive 6*.



Computer Arts Special Photoshop – COSB0034

Included in this 100 per cent *Photoshop* issue are eight brand new tutorials. These cover painting in *PS7*, amazing scanning tricks, *Photoshop*'s top 12 filters, and create the the cover image with our tutorial on special colour and print techniques. Also in this issue, 54 expert tips, learn all there is to know about *Photoshop* PDFs and an in-depth hardware guide to help you choose the right equipment.

CD The full version of *Dreamy Photo* (dual) with the complete *DreamSuite* plug-in, *PS6* demo.



Computer Arts Special Get started in digital art – COSB0035

This 100-page issue gives you a complete overview of the digital creative scene, including beginner's guides to: illustrating in *Photoshop 7*, *Painter 7*, *Illustrator 10*; Web design with *Dreamweaver MX* and *Flash MX*; *Flash* animation; creating 3D graphics in *Bryce 5*, *Poser 4* and *D Sculptor*; print and multimedia design using *InDesign 2* and *Director 8.5*. We also show you how to use *ActionScript*.

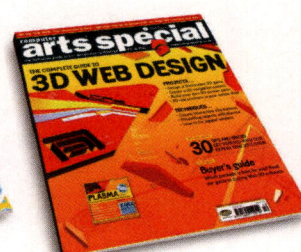
CD The full version of *D Sculptor* plus demos including *Flash MX*, *Dreamweaver MX* and *Bryce 5*.



Computer Arts Special MX – COSB0036

An entire issue dedicated to the *MX* applications *Dreamweaver*, *Flash* and *Fireworks*. Individual tutorials include: developing an e-zine and Web streaming databases in *Dreamweaver MX*; creating motion blur and using sound to control moves in *Flash MX*; site prototyping and animation in *Fireworks MX*. The issue concludes with a big project that uses all three applications to build a virtual radio.

CD The full version of *Flix 1.0* plus demos of *Dreamweaver MX*, *Flash MX*, *Fireworks MX* and *Flix Pro 2.5*.

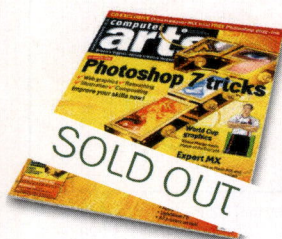


Computer Arts Special 3D Web design – COSB0037

Our complete guide to Web 3D shows you how to: design a Shockwave game, create a virtual multimedia player in *AXEL*, and build a screen saver in *Xara 3D*. We also have tutorials for modelling in *Swift 3D* and *plasma*, and for combining film and 3D footage in *Commotion*. Plus, there's a feature on creating a 3D online store with spinning objects and a round-up of the latest Web 3D books.

CD Full version of *Xara3D 2.1* (PC) plus *AXELedge*, *Swift 3D v2*, *plasma*, *Commotion* demos and more

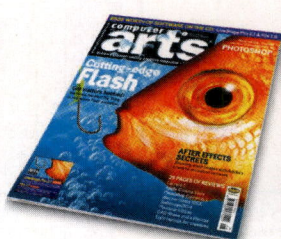
COMPUTER arts



Issue 72 – Code COA72

Photoshop 7 tricks

CD *Dreamweaver MX*, *Fireworks MX*, *Toon Boom Studio 2*, *Poser 4*.



Issue 73 – Code COA73

Cutting-edge *Flash*

CD *LiveStage Pro 2.1* (full), *Flix 1.0* (full), *Flash MX*, *After Effects 5.5*.



Issue 74 – Code COA74

Digital Photography

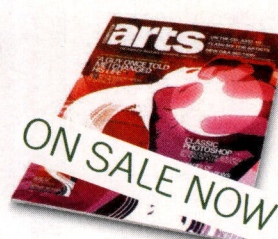
CD Demos of the exciting new 3D tools *plasma* and *trueSpace 6*.



Issue 75 – Code COA75

Illustrating with style

CD *VideoClix 1.3* (full), free sounds, *FreeHand 10*, *After Effects* trials.



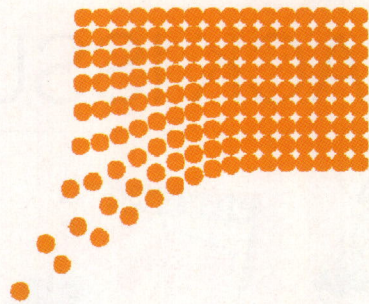
Issue 76 – Code COA76

Attik, TDR, Mill film speak out

CD *AXel 1.0* (full product), video tutorial on *PS7*, *AXELedge 1.5* trial

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Complex effects using FILTERiT

Expand the capability of *Illustrator* with this comprehensive suite of plug-ins to create simple and complex effects in minutes...



Expertise provided by Chris Schmidt. You can contact Chris at [e] chris@track5.co.uk or [w] www.track5.co.uk.



Files on disc
A 30-use full version of FILTERiT is on the cover CD. And the files to support this tutorial can be found in the Tutorial\FILTERiT folder.



FILTERiT is a complete suite of plug-ins for Adobe *Illustrator* that provides a wealth of features and effects to add to your arsenal of illustration tools. Many of the effects possible would take hours to achieve, but with a little imagination and a bit more help from the software you'll soon be creating 3D transformations, preparing images for Web animation using the Trace option, producing motion blur effects using *Illustrator 9+* transparency support and more.

When installed, a whole range of new tools becomes available through the *Illustrator* toolbox, offering everything from simple alignment of anchor points to duplication, distortion of selected objects and replication along a path all while retaining the space, angle, shape and colour of the copies.

Install the demo of the software and follow this tutorial to find out some of the results possible through FILTERiT. You'll soon be knocking out effects that were previously thought impossible or impractical in a vector package.

Part 1: Power tools

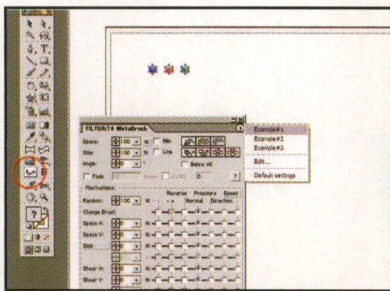
A quick introduction to the powerful new tools you have available...

Small is beautiful

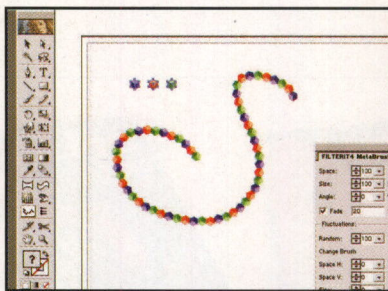
The most effective results when using the MetaBrush are obtained when the original object is relatively small to the canvas. Many of the more linear effects simply cannot be rendered within the restricted canvas if the original images are too large.

Text notes

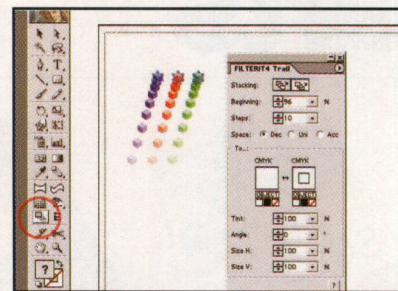
When working with text objects, you must first convert the type into outlines. Do this in *Illustrator* by selecting your text object and choosing the Type>Create Outlines option.



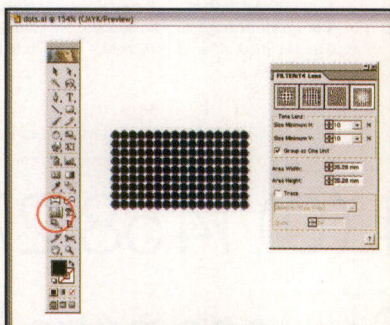
1 Open the boxes.ai file from the CD and select all the objects. Expand the MetaBrush tool to access its options and, for a quick demo, choose one of the preset examples through the Preset Menu.



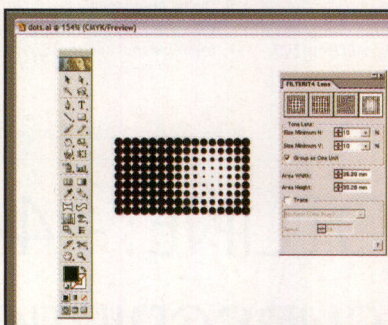
2 Draw freely around the blank canvas to see how your selected objects are used to generate a path. Undo and try the other examples before experimenting and configuring your own MetaBrush.



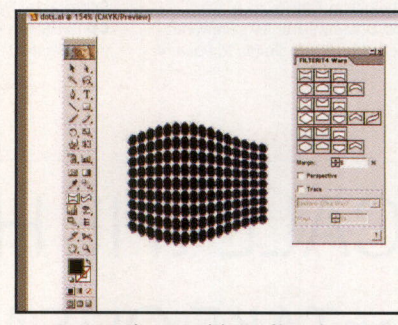
3 Back to the original boxes.ai, click and hold the MetaBrush tool to access the Trail option. Again, with all the cubes selected, click and drag in any direction to create an instant trail effect.



4 Next, open the dots.ai file from the CD to try out some other cool effects. Select all and bring up the Lens options by choosing the new tool from your toolbox. Choose one of the preview options from those available.



5 Next, with the dots still selected click and drag the mouse over your selection. You can see how the filter is affecting the paths for the final result as your mouse moves. Undo and try the other lens effects or configure your own.



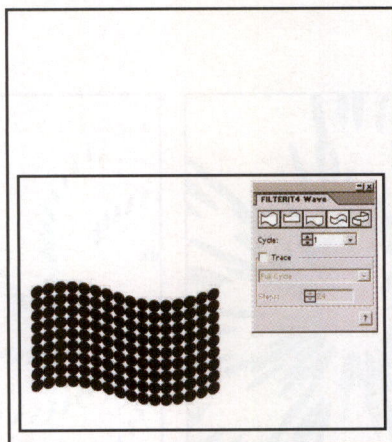
6 Revert to the original dots.ai file and experiment in a similar way with the Warp and Wave tools found directly above the Lens tool. The Warp tool is provided with a number of predetermined options for some impressive and instant results.

Mouse sculpting

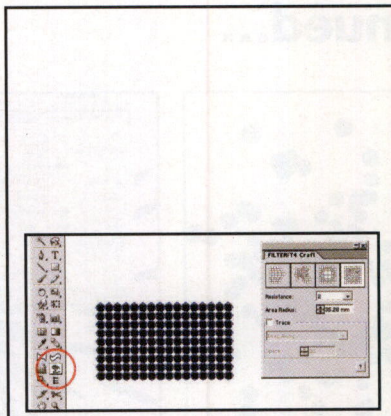
The different tools can be sculpted and modified by clicking and dragging the mouse in horizontal or vertical movements to affect different values and elements depending on the selected tool. With some experimentation and a little familiarity, some original effects can be created in a matter of seconds.

Tracing tips

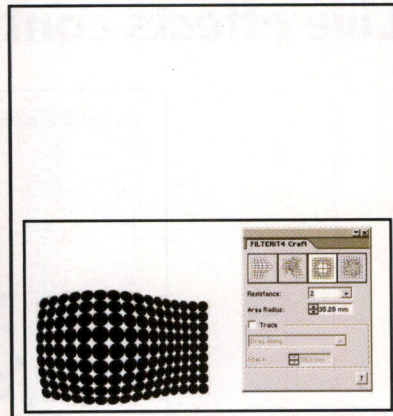
When using the Trace function you can place each object created on a separate layer by pressing the Control key when you release the mouse button. This is comparable to using Illustrator 9's Release to Layers command.



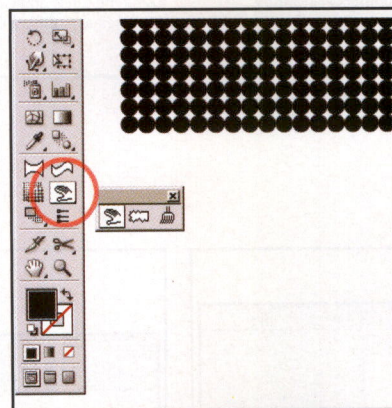
7 Similarly, the Wave tool has a number of options for adding depth and movement to objects that would be difficult to recreate through conventional methods.



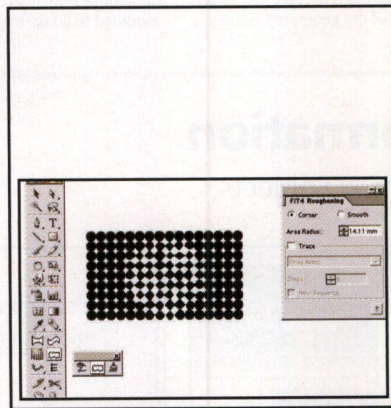
8 Below the Wave tool is the Craft option. Again, revert to your original dots.ai file and select the tool to make your options available to you. You should be familiar with how the tools work by now so choose one of the main options in the Craft palette.



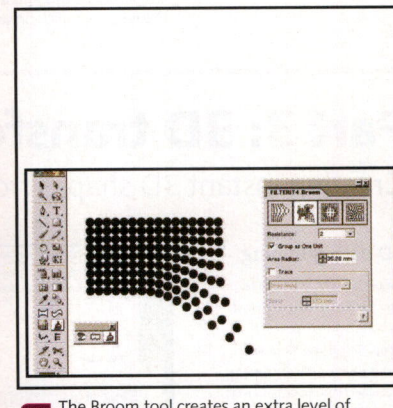
9 This tool allows the results to be a little more sculpted and can provide some convincing 3D effects from your original 2D object. When you've finished experimenting with this tool, revert back to your original dots.ai file.



10 Click and hold the Craft tool button for access to a couple of related tools that also provide a little more artistic control over your effects through the Roughening and Brush tools.



11 The Roughening tool creates irregular edges along any path that falls within its target area by applying a series of randomly generated values to create new anchor points and path segments.



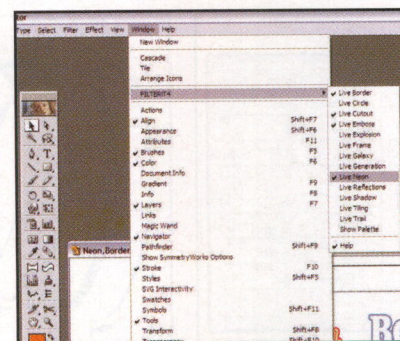
12 The Broom tool creates an extra level of freedom enabling you to drag selected objects while retaining their affected relationship. For best results use a selection based around numerous smaller objects such as our dots.

Part 2: Live effects

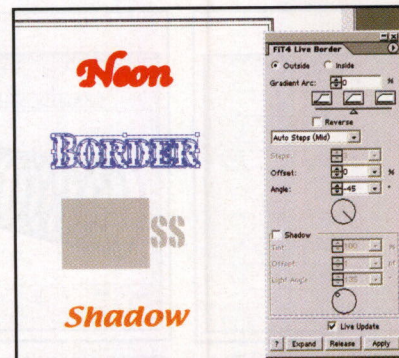
Applied effects that remain fully editable...

Live trails

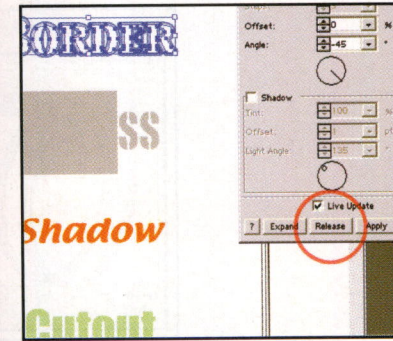
The Trail tool provides a quick method of creating effects that remain fully editable, but the Live Trail (accessed via the Window>FILTERIT>Live Trail) provides a similar feature but with much more control over the results.



1 In addition to the tools we've just looked at, FILTERIT provides a range of filters accessible under the Window>FILTERIT menu that provide a range of effects usually associated with bitmap graphics.

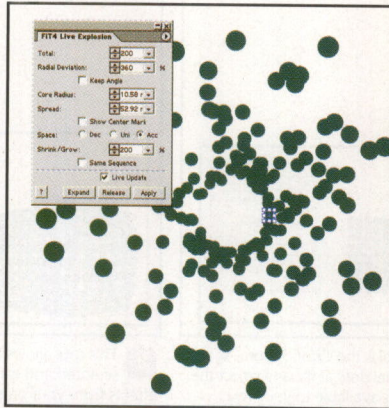


2 By now you should be familiar with the ways of FILTERIT. Open the text.ai file and experiment with the various Filters as we did with the tools, by selecting an object and applying the effect.

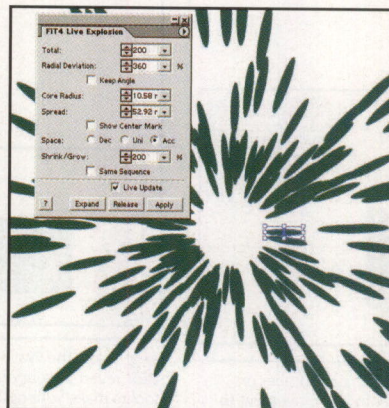


3 As well as being much more flexible than the standard tools, live effects retain the original graphic. By selecting an affected image and using the Release button in the corresponding palette, any such changes are instantly reverted at any time. >

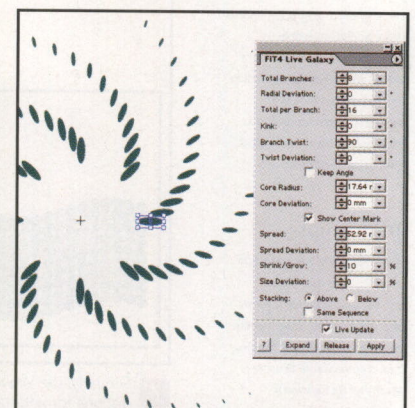
Live effects continued...



4 There are a couple of filters worth noting. Open a new file and create a small and simple shape; select this and apply the Live Explosion effect. Deselect and click on any of the generated images.



5 You'll notice only the original graphic is selected. Modify this by adjusting the shape and notice how the reliant effect is instantly modified to adapt to your changes.



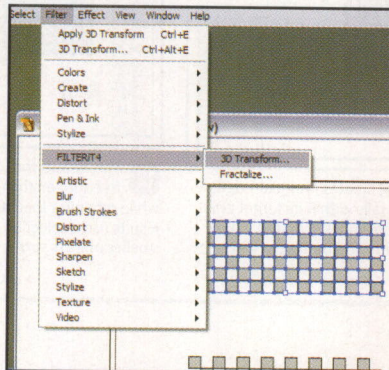
6 Release this effect to revert back to your original shape. Similar effects can be achieved through using the Circle and Galaxy filters. Again, tweaking the original graphic will affect those generated.

Part 3: 3D transformation

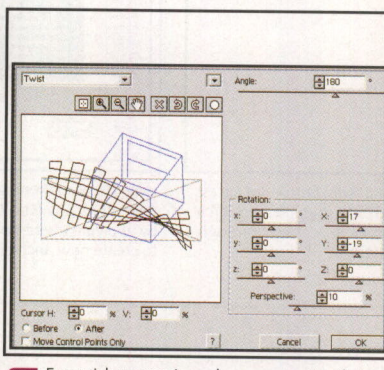
Creating instant 3D shapes from 2D objects...

3D path grouping

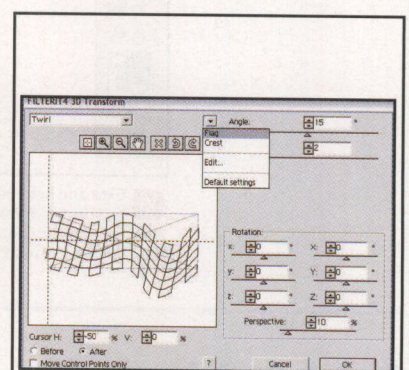
The position of grouped paths after the 3D Transform is based upon the top-most path in a group. You can use *Illustrator's* Layers palette to determine how your object is grouped before the transformation. Simple Rotation is not affected by grouping.



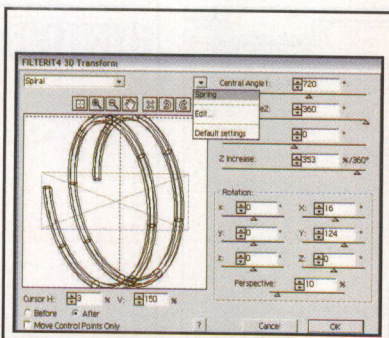
1 Open the 3D.ai file from the CD and select one of the three patterns. Select the Filter>FILTERIT4>3D Transform option to access the dialog options for this particular tool.



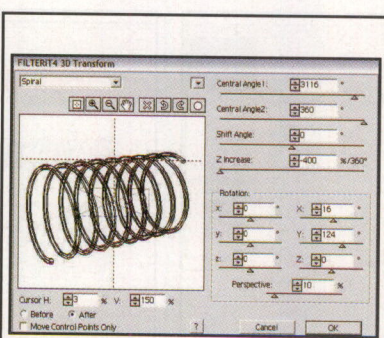
2 For quick conversions choose an option from the drop-down list; your selection is then previewed in the main dialog window. This can be freely moved around allowing you to get the best angle to your conversion.



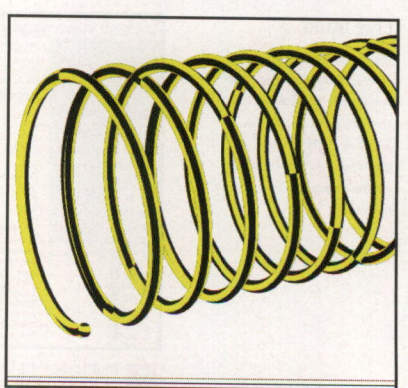
3 Secondary options are available based around the initial shapes available in the drop-down. For a predefined waving flag effect, for example, choose the Twirl shape and then the Flag option here.



4 The controls available in the right of the 3D Transform interface adjust depending on the initial shape selected. Revert to your original and select the Spiral shape with Spring as your secondary option.



5 You can now adjust the composition of the object most effectively through the Central Angle 1 and Z Increase controls, but play around with the other options remembering to use the Zoom and Undo buttons when necessary.



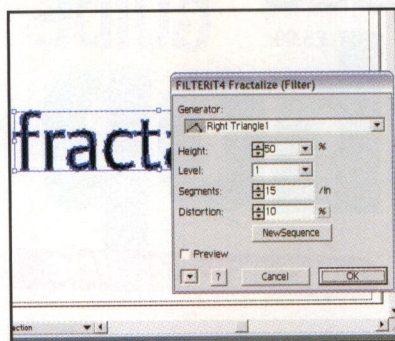
6 Click OK when you've finished and consider how long it would take to create a similar image using *Illustrator's* standard tools.

Part 4: Rough it

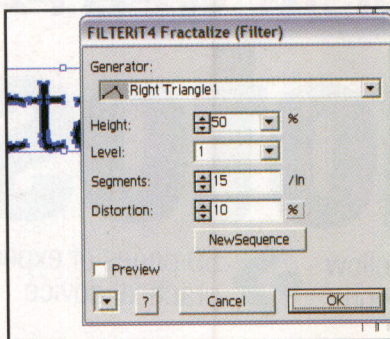
Get away from the clean vector look with the Fractalize tool...

Fractalize filters and effects

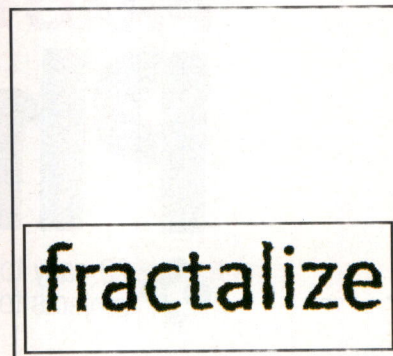
As an effect, the original object can still be edited, as can the attributes of Fractalize. As a filter, Fractalize permanently changes the original object. To alter or remove the Fractalize effect, select the object on the Artboard and double-click Fractalize in the Appearance palette. Change the Fractalize settings and click OK.



1 The Fractalize tool can be a useful method of grunging your work. Open the Fractalize.ai file, select all, and launch the Fractalize interface via Filter>FILTERiT>Fractalize.



2 Choose the Right Triangle 1 generator and input the values shown above of Height 50%, Level 1, Segments 15/inch and Distortion of 10%. Click OK and deselect all.



3 The fractalized results couldn't be further from the clean and crisp lines normally associated with vector artwork. **case**

FILTERiT [full version]

Now you've tried our tutorial using the demo of FILTERiT, here's what the full version can do...



FILTERiT features various exciting and unique effects. Whether you work in print, multimedia, Web design or even video, FILTERiT can stimulate your creative imagination.

Features

Play around with FILTERiT for a while to discover for yourself the variety of features it has to offer...

- It enables you to create complex images in seconds, which would otherwise take a long time to design in *Illustrator* alone.
- Some effects are simply impossible to make without it.
- With its easy-to-use features, you have the ability to create astounding images, both simple and complex.

Latest version

The new version, FILTERiT4.1, supports *Illustrator 10*. The upgrade contains several features including support for the Colour Picker on Live Trail and the Trail tool and MetaBrush tool on *Illustrator 9* and *10*, which gives you better control for choosing colour.

Requirements

FILTERiT4.1 is compatible with *Illustrator 10* on Mac OS 9.1 or later or OS X and Windows XP. The new version performs significantly faster in *Illustrator 10* compared with 8 or 9.

Macintosh:

- Adobe *Illustrator 8, 9* and *10*

- Mac OS 9.1, 9.2 or Mac OS X
- CD-ROM drive

Windows (downloads available now!):

- Pentium or faster (Adobe *Illustrator 9.0* requires Pentium II)
- Windows 98/Me/2000/NT4.0/XP
- Adobe *Illustrator 8, 9* and *10*
- Windows 98/Me requires *Illustrator 9.0*
- CD-ROM drive

To order FILTERiT 4.1 at **\$129** for the *download* and *boxed* copies

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Corps was established in 1989 and delivers professional courses that inspire individuals to explore the creative potential of software packages. It has an enviable reputation endorsed by authorisations from Macromedia, Adobe, Media 100, Quark and Extensis. Corps is also Apple Solution Experts.

The company is based near St James's Park, and offers a wide range of training solutions, Bespoke Training, Scheduled Courses and Evening Classes.

Corps also recruits design and sales staff to the creative and media industries. Its recruitment team tests all applicants at interview stage to ensure it

places candidates who meet and exceed clients' expectations.

Question

In what year was Corps established?

To enter

The easiest way to register your entry is via our Website at [w] www.computerarts.co.uk/competitions. Or you can click the Competition tag on the Contents screen of our cover CD, then enter Corps as the competition name, and fill in the rest of the form. Click Submit Entry. If you don't have Web access, you can send your answer on a postcard, along with your address and a contact number to: Corps Competition, Computer Arts Special, 30 Monmouth Street, Bath, BA1 2BW.

The rules

The competition closing date is 5 December 2002. Employees of Corps Business Training Centre or Future Publishing, or any of their agents or families, may not enter. Multiple entries will not be accepted. The editor's decision is final. There are no cash alternatives. No other correspondence will be entered into. If you are entering by post and do not wish any of the companies involved in this competition to contact you with further offers, indicate this on your entry. We won't pass details on to third parties.

Please indicate on your entry which training course you prefer.

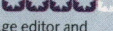


For further details visit [w] www.corps.co.uk,
[e] training@corps.co.uk or [t] 0207 222 8484.

Choose your tools...

- Pencil
- Paper
- Scanner
- Illustrator 10
or FreeHand 10
- Photoshop 7
- Graphics tablet

Product	Platform	Price	Company	URL	Issue	Verdict
Vector illustration/2D bitmap and paint						

	Photoshop 7	PC/Mac	£528	Adobe	www.adobe.com	68	
Version 7 of the de facto standard tool for image-editing and animation features OS X compatibility, a File Browser for searching for and opening files, a Healing tool for quickly removing blemishes and scratches and an array of natural-media brushes. Still the best.							
	Painter 7	PC/Mac	£300	Procreate	www.procreate.com	62	
Re-branded and revamped, the natural media package boasts a painterly toolset like no other in the industry. New features such as the super-realistic Watercolour tools and the gloopy Liquid Ink brush make for an excellent upgrade to an already superb application.							
	Paint Shop Pro 7	PC	£94	Digital Workshop	www.jasc.com	51	
A feature-rich and powerful photo-editing, paint and vector art program for less than £100. <i>PSP 7</i> is at first glance a bargain that any digital artist would be mad to miss. The only problem is that the app is rather sluggish when dealing with larger files.							
	FreeHand 10	PC/Mac	£328	Macromedia	www.macromedia.com	58	
One of the two industry-standard vector apps (the other being <i>Illustrator</i>) <i>FreeHand 10</i> has a variety of excellent print and Web-based tools. In addition to new tools and enhanced <i>Flash</i> export, the interface now echoes that of Macromedia's other Web tools.							
	Illustrator 10	PC/Mac	£387	Adobe	www.adobe.com	65	
It's still not a multi-page program, but this 2D vector drawing software offers innovative symbol tools, powerful envelope features and good Web image-slicing. Still the best for reliable PostScript-clean EPS output and for versatile transparency and feathering.							
	CorelDRAW 10	PC/Mac	£420	Corel	www.corel.com	52	
Comprising of <i>DRAW</i> (vector graphics), <i>Photo-Paint</i> (bitmap editing) and <i>RAVE</i> (SWF animation), <i>CorelDRAW 10</i> is certainly a good value suite of graphics apps. The main app – <i>DRAW</i> – has possibly the best texture fill effects you'll find in any graphics package.							
	Expression 2	PC/Mac	\$149	Creature House	www.creaturehouse.com	56	
Enabling you to paint vector-based editable strokes, <i>Expression</i> was a revolution when released in 1996. The package was reborn last year, with version 2 bringing a new rendering engine and rehashed UI. Tricky to use at first, but an exciting and refreshingly different application.							
	Photoshop Elements 2	PC/Mac	£88	Adobe	www.adobe.com	73	
A cut-down version of <i>Photoshop</i> for the budget digital camera or Web user, <i>Photoshop Elements 2</i> is an excellent all-round image editor and great value for money. Features Quick Fix dialogs, a new Selection brush for masking and vector shapes. If you can't afford <i>PS 7</i> , get this.							

	Dreamweaver MX	PC/Mac	£351	Macromedia	www.macromedia.com	71		
<i>Dreamweaver MX</i> sports a completely different interface to its predecessors, but nevertheless it's a brilliant upgrade. Built-in database tools and improved templates, plus better integration with <i>HomeSite</i> make this a must buy for any Web designer.								
	Freeway 3.5	Mac	£165	SoftPress	www.softpress.com	71		
Think of <i>Freeway</i> as the <i>QuarkXPress</i> of Web design. Several tools that will be immediately familiar to print designers are in place, for true drag-and-drop Web designing. Native <i>PSD</i> and <i>Illustrator</i> import tools, plus the ability to import <i>Flash</i> and <i>Director</i> files, make for a top application.								
	Flash MX	PC/Mac	£433	Macromedia	www.macromedia.com	69		
A refined interface, multiple libraries, a <i>Dreamweaver</i> -like Property Inspector and a slew of easy-to-use editing tools are at the heart of <i>Flash MX</i> . These are joined by a host of scripting enhancements and the ability to import video directly into the application. An essential Web tool.								
	Fireworks MX	PC/Mac	£257	Macromedia	www.macromedia.com	71		
Macromedia's Web graphics editor, <i>Fireworks</i> , seamlessly combines bitmap and vector editing tools. The <i>MX</i> interface is here, as are improved type tools, and a variety of <i>Photoshop</i> -esque darkroom tools (Dodge, Burn and the like). The perfect companion to <i>Dreamweaver MX</i> .								
	Director 8.5	PC/Mac	£1115	Macromedia	www.macromedia.com	58		
Once a tool purely aimed at the creation of CD-ROMs, <i>Director</i> has established itself as a powerful package for both online and offline content creation. Version 8.5 adds the Shockwave 3D format to the app, hoping to at last bring a viable online 3D format to the Web designer.								
	GoLive 6	PC/Mac	£386	Adobe	www.adobe.com	68		
<i>GoLive 6</i> targets serious developers with a host of workgroup-orientated tools. It also enables designers to output to a plethora of formats, including wireless. Site diagramming tools and improved CSS functionality are also present, making this tool a great rival to <i>Dreamweaver</i> .								

Product	Platform	Price	Company	URL	Issue	Verdict
 LiveMotion 2	PC/Mac	£175	Adobe	www.adobe.com	68	★★★★★
ActionScript, excellent support for bitmaps, Live Tabs, and excellent QuickTime and SWF export tools all make <i>LiveMotion 2</i> a worthy competitor to the mighty <i>Flash</i> . <i>After Effects</i> users will love the similarity between the two apps. Adobe aficionados will appreciate the interface.						
 Toon Boom Studio 2	PC/Mac	\$374	Toon Boom	www.toonboom.com	72	★★★★★
An excellent application for those looking to create 2D cartoons destined for the Web, <i>TBS2</i> has many intuitive and powerful features, including 3D Sceneplanning, lip-syncing tools, an array of drawing tools and excellent import/export functionality. A top product.						
 plasma	PC	£525	Discreet	www.discreet.com	72	★★★★★
Discreet's venture into the world of Web 3D proves to be a great effort. It looks and feels like <i>3ds max</i> , but it exports to <i>Shockwave 3D</i> and SWF formats. Web designers will no doubt struggle with the new medium to begin with, but 3D artists will ultimately find it a great Web 3D solution.						

DTP

 QuarkXPress 5	PC/Mac	£1287	Quark	www.quark.com	69	★★★★★
<i>XPress 5</i> brings Web design functionality to the already excellent page layout tools of previous releases. There's also a table designer, a new, if a little weak, Layers palette and revised printing controls. Minimal hardware requirements are a boon, but it's still twice the price of <i>InDesign 2</i> .						
 InDesign 2	PC/Mac	£668	Adobe	www.adobe.co.uk	67	★★★★★
Featuring native transparency, an abundance of intuitive design tools and excellent typographic controls, <i>InDesign 2</i> does everything that <i>XPress</i> does and more. High system requirements mean it can be a little sluggish on older machines, but all in all <i>InDesign 2</i> is an outstanding effort.						
 PageMaker 7	PC/Mac	£476	Adobe	www.adobe.com	61	★★★★★
A veteran in the world of DTP, version 7's new features include the ability to place native <i>Photoshop</i> files and assert greater control over PDF files. Easy to use and bundled with heaps of clip art and templates, <i>PageMaker 7</i> is a quality, value-for-money package.						

Hardware

Printers

 Canon S9000	PC/Mac	£379	Canon	www.canon.co.uk	72	★★★★★
The Canon S9000's performance is something of a leap forward. It is the fastest inkjet we've ever seen, and it's ideal for a busy user who has to produce frequent proofs or finished output. What's more, it offers full-bleed (edge-to-edge) printing and is fantastic value of money.						
 Epson Stylus Pro 5500	PC/Mac	£1874	Epson	www.epson.co.uk	72	★★★★★
The Stylus Pro 5500 is capable of producing images that will look good for 200 years (or so we're told). It uses special pigment ink, and paper that is ultra-violet resistant, enabling you to produce images that are suitable for display in galleries or windows.						
 Epson Stylus Photo 2100	PC/Mac	£521	Epson	www.epson.co.uk	74	★★★★★
Capable of printing on A3+ media at a resolution of 2800x1440dpi, the Stylus Photo 2100 produces high-quality prints using seven individual ink cartridges which are economical to replace.						

Monitors

 NEC FE1250+	PC/Mac	£575	NEC	www.nec-mitsubishi.com	66	★★★★★
Sacrificing such refinements as a USB hub and multiple inputs, the NEC FE1250+ nevertheless proves to be an excellent monitor for those after a large screen for little cash. Cleanly styled, with simple, ergonomic controls and a perfectly flat Mitsubishi tube, this display is a bargain.						
 Sony FW900	PC/Mac	£1409	Sony	www.sony-cp.com	66	★★★★★
Sony claims the FW900 is the world's first 24-inch widescreen Trinitron monitor. Whether or not this is true, it's one fine piece of kit. Colours are superb, connectivity is excellent (in the form of a five-port USB hub) and you can run apps at 16:10. If you have the cash, get one.						
 Sony E530	PC/Mac	£645	Sony	www.sony-cp.com	67	★★★★★
With great styling, intuitive menu controls and a top-quality picture, the Sony E530 proves to be great value for money. In short, if you need a 21-inch and want the gorgeous display quality that a Trinitron tube has to offer – at as little cost to you as possible – the E530 should be considered.						

Scanners

 Fujifilm FineScan 2750	Mac	£7637	Fujifilm	www.fujifilm.co.uk/gs	62	★★★★★
The FineScan 2750 offers prepress-quality output at a reasonable price (especially when you consider drum scanners can cost up to £50,000). For pro-quality output at up to 7500dpi combined with sublime ease of use, this is the best scanner within this price bracket.						
 Microtek ScanMaker 8700	PC/Mac	£800	Microtek	www.microtek.com	68	★★★★★
The ScanMaker 8700 carries on Microtek's fine tradition of producing top-quality A4 scanners with truly professional features. Glassless transparency scanning coupled with excellent scanning speed and FireWire connectivity add up to one classy device.						
 Epson Perfection 2450 Photo	PC/Mac	£299	Epson	www.epson.co.uk	68	★★★★★
A small scanner, the Epson Perfection 2450 Photo is capable of scanning at 2400x4800 dpi. Extremely fast, hooks up via FireWire or USB 2.0, and capable of scanning negs up to 4x9-inches, this is a terrific value scanner for the creative pro on a budget.						

Contacts

Software

Adobe
Sales: [t] 0131 458 6842
Support: [t] 0131 451 6888
Macromedia
Sales: [t] (CU) 020 8200 8282
Support: [e] eurosupport@macromedia.com
Corel/Procreate
Customer services: [t] 0800 581028
Support: [t] 020 7298 8516
jasc (Digital Workshop)
Sales: [t] 0870 120 2186
Support: [e] support@digitalworkshop.com
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Support: [e] contact@creaturehouse.com
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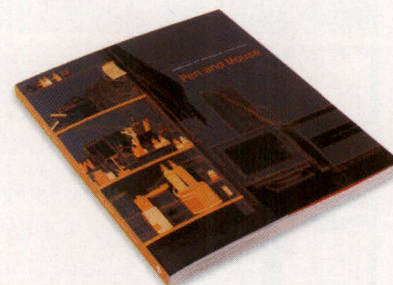
ISBN

1856692310

Art, illustration and publishing come together in this book that describes itself as "... investigating the work of image-makers whose craft occupies the space somewhere between graphic design and fine art and whose tools are increasingly those of a digital medium." The work of some 45 experimental artists including Nick Higgins, Mike Mills and Akio Morishima is showcased, as they attempt to explain the tools they use and their motivation.

After an introductory essay from the author outlining the effects of technology on art and illustration, each artist's work shows a technological influence, even if it's not overt.

The short email style conversations between the author and artists in this book reinforce the idea that we're dealing with the design elite, who are a little aloof with their answers. Don't expect insights into image creation; this is not a how-to book, but one that you should savour now and use to feed your imagination.



Verdict



Essential techniques

Design Essentials Fourth Edition

Price

£29.99

Author

Luanne Seymour Cohen

Publisher

Adobe Press

ISBN

0201713632

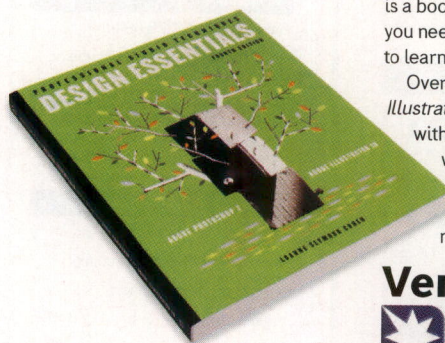
Now fully revised and updated, this fourth edition continues in the vein of earlier editions offering a cookbook of techniques and effects that you can apply to your own designs.

This is not a how-to book in the usual sense. Much is taken for granted, not least your own proficiency with each of the programs. Intermediate and advanced users will gain the most here.

Divided into five sections that broadly cover painting, drawing, textures, text and special effects, this is a book that you can dip into when you need inspiration or when you need to learn about a specific effect.

Overall, this is a recipe book for all *Illustrator* and *Photoshop* users. As with a culinary cookbook, you will find some recipes you like and others you don't, but they all ultimately offer a more interesting taste.

Verdict



Illustrator basics

The Complete Idiot's Guide to Computer Illustration

Price

£22.99

Author

Marc Campbell

Publisher

Pearson Education

ISBN

0028643194

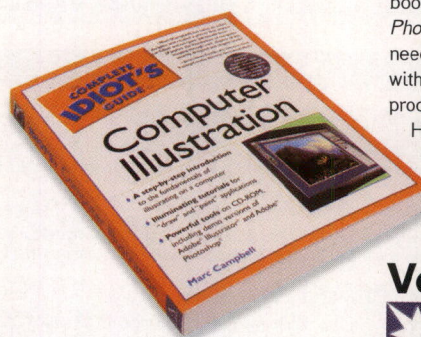
If you're looking for a book that will teach you the basic tools of *Illustrator*, look no further. This addition to the

Complete Idiot's series will arm you with all the tools and skills you need to realise your designs. However, the book also gives the false impression that anyone can become a graphic designer by just installing copies of *Illustrator* and *Photoshop*.

Clearly the computer now dominates many design fields, but the illustration programs featured in this book are only tools. Installing *Photoshop* isn't enough — users still need at least some modicum of talent with a pen and paper in order to produce entertaining work.

However, if you're new to *Illustrator* then you'll find plenty of straightforward advice here — the vast majority of the tutorials in this book being for that program.

Verdict



Lessons in multipublishing

Flash MX FreeHand 10 Advanced

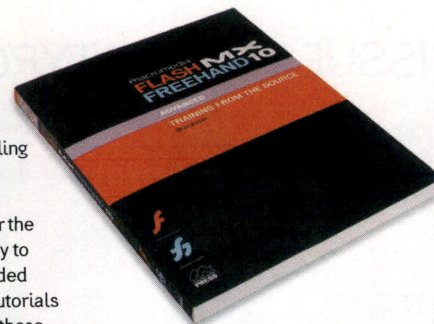
Price
£33.99
Author
Brad Kozak
Publisher
Peachpit Press
ISBN
0201775026

The integration of two or more publishing tools is something that Macromedia calls multipublishing. In this excellent addition to the Training From The Source series, you will see how excellently matched *FreeHand 10* and *Flash MX* are in the multipublishing environment where today's graphic design lives. With the author's readable style and excellently laid out steps, this is a superb introduction to *Flash MX*.

At first glance this is a slim volume containing only ten lessons. However, on closer inspection you quickly realise

that each lesson is a powerhouse of knowledge that will teach you more about handling each program's tools than some manuals twice its size.

FreeHand and *Flash MX* offer the designer the perfect opportunity to bring movement and much needed dynamism to any graphic. The tutorials show each of the techniques in these real-world examples can be applied to your next project. If you are just exploring *Flash MX* in particular, this manual will open your eyes to its extensive possibilities.



Verdict



Intermediate FreeHand

FreeHand 10 f/x & Design

Price
£34.99
Author
Ron Rockwell
Publisher
Coriolis
ISBN
1588801640

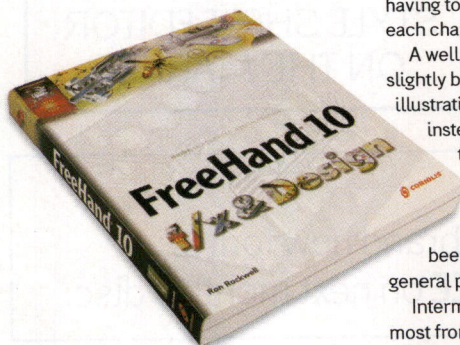
Suitable for intermediate to advanced users, the author assumes that you have at least a working knowledge of the basics of *FreeHand*, freeing him to offer more detailed tutorials that will allow you to stretch your skills.

Beginning with the ubiquitous overview of the *FreeHand* interface, this manual can be dipped into at any point allowing the reader to look for features that attract them, instead of having to laboriously work through each chapter.

A well presented manual is marred slightly by a lack of supporting illustrations and screenshots, relying instead on textual explanations of the tool or feature under discussion. A colour supplement is included, but this resource would have been better spent on improving the general presentation of each tutorial.

Intermediate users will gain the most from this manual as they polish their skills. However, with better thought to layout and a few more illustrations, this could have lifted itself from the crowd of other *FreeHand* manuals and shone a little brighter.

Verdict



Illustrator in detail

The Illustrator 10 Wow! Book

Price
£37.99
Author
Sharon Stever
Publisher
Peachpit Press
ISBN
0201784815

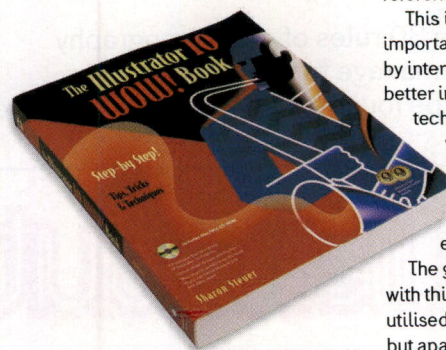
Broadly following the same format and layout as the Wow! book on *Painter*, this edition is a little more text heavy, but is no less useful. Over 12 chapters, *Illustrator 10* is put through its paces with well-structured tutorials that all follow the same format of basic technique followed by useful tips, exercises and techniques, before the gallery and reference section.

This is a manual that serves two important purposes: it can be used by intermediate users to gain a much better insight into each core

technique and tool, while veterans will be able to use it as an excellent reference guide. Mac users will also be grateful for the short, but essential, information on OS X.

The gallery section is extensive, with this space perhaps better utilised for more in-depth tutorials, but apart from that, this is yet another superb addition to the Wow! series of books. No matter what your level of proficiency with *Illustrator 10*, you will find something here that will make you go Wow!

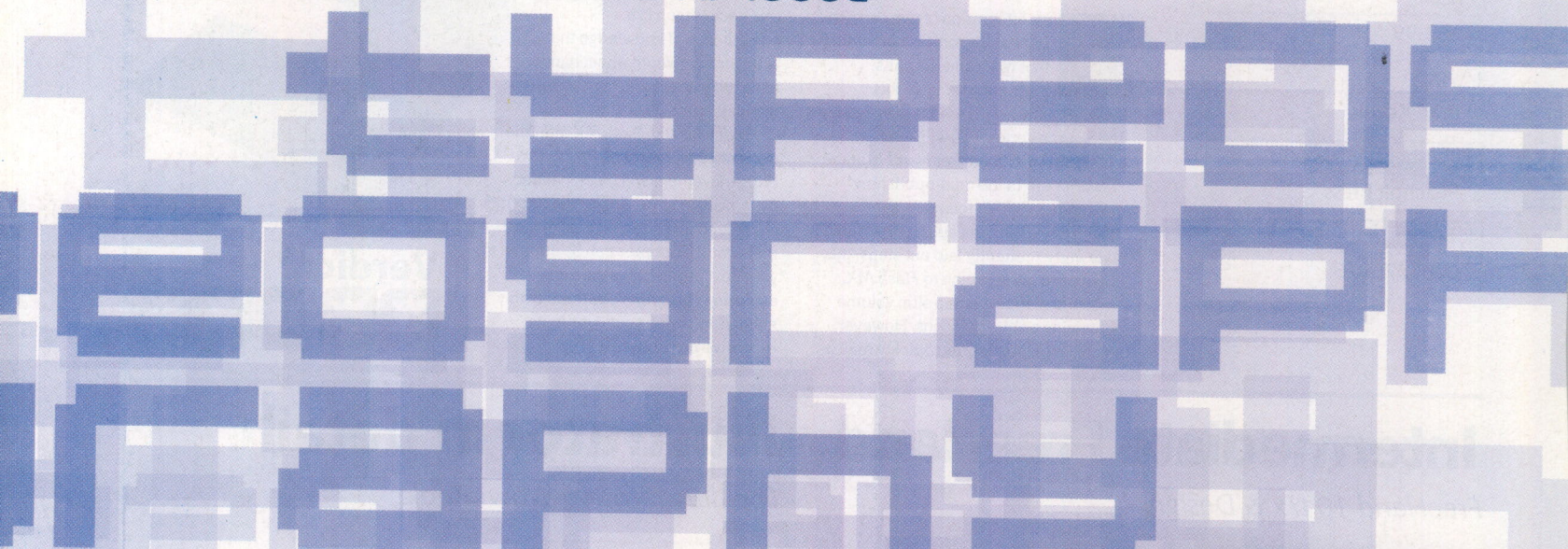
Verdict



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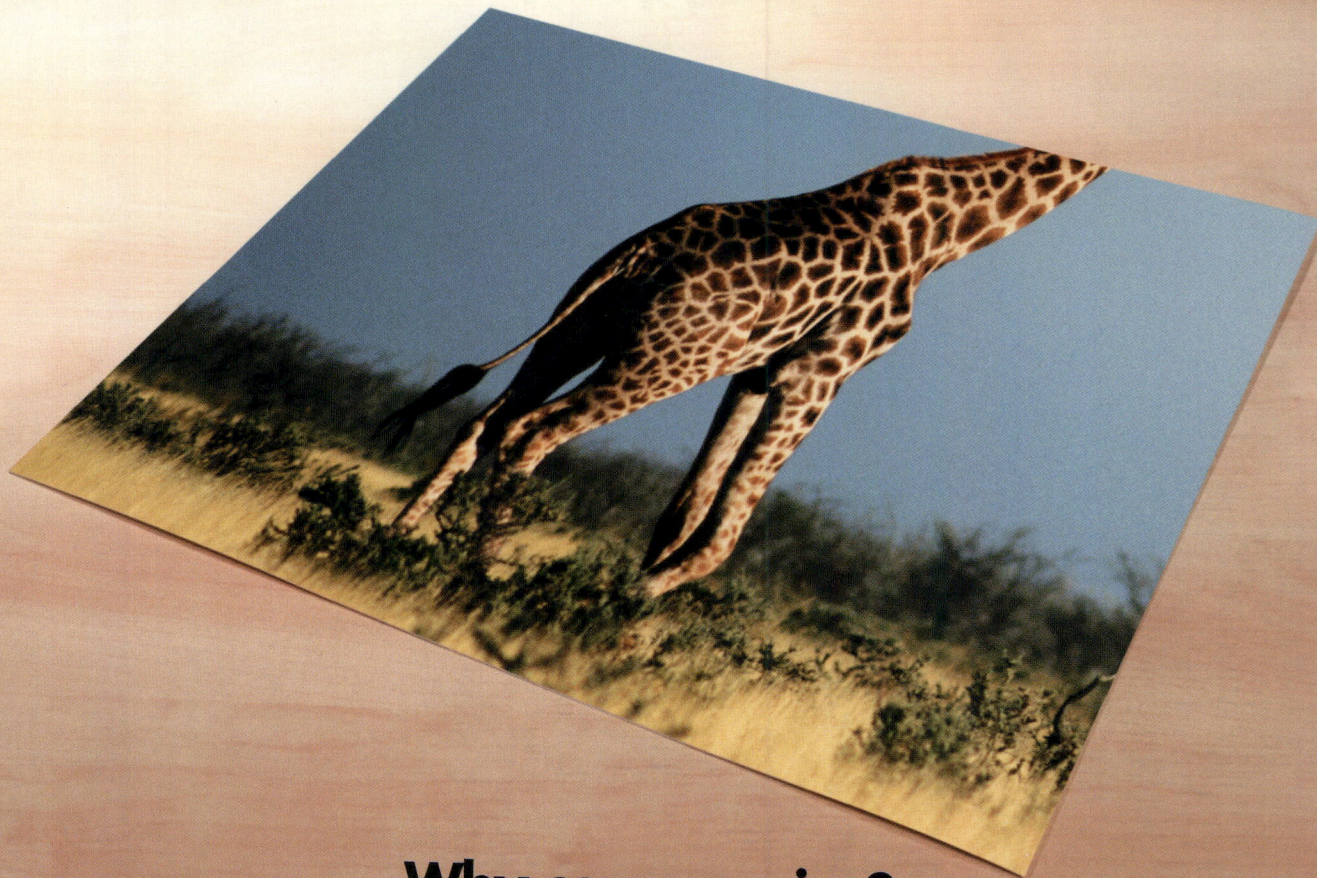
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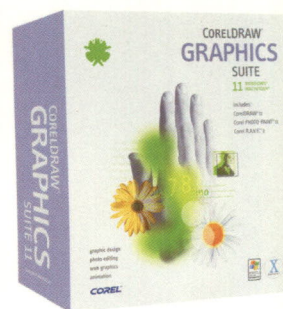
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